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**ENVIRONMENTAL SITE ASSESSMENT  
AND  
SOIL ANALYSES REPORT**

**FOR THE PROPERTY  
LOCATED AT  
1845 EAST WILLOW STREET  
SIGNAL HILL, CALIFORNIA**

**PREPARED FOR  
DICO OIL COMPANY  
P. O. BOX 7654  
LONG BEACH, CALIFORNIA  
(310) 427-6074**

**SEPTEMBER 30, 1994**

## **POOR LEGIBILITY**

**ONE OR MORE PAGES IN THIS DOCUMENT ARE DIFFICULT TO READ  
DUE TO THE QUALITY OF THE ORIGINAL**

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## 1.0 EXECUTIVE SUMMARY

Dico Oil Company contracted with Geological Research to implement an investigative field program to evaluate the potential for subsurface contamination relating to six (6) above ground waste oil storage tanks located at their Signal Hill, California facility. The investigation included measures to complete eight (8) exploratory borings in locations designed to provide data representing in-situ conditions surrounding the existing storage tanks and the tank farm in general.

Historical information provided for the site indicated that some surface contamination extended downward to an elevation of approximately 3-feet below ground surface (bgs). Further sampling indicated little or no petroleum constituents at 6-feet bgs. Therefore, total maximum depth for each boring was designed to be approximately 9-feet bgs. Sample collection was designed to be at elevations of 3, 6, and 9-feet bgs. This would provide comparative analyses of previous sampling results of the 3 and 6-feet bgs elevations and would additionally provide data at 9-feet bgs elevation to better evaluate vertical involvement.

Results of laboratory analyses indicates that the only petroleum derived fuel detected during the investigation was diesel fuel. It appears topical and quickly diminishes at lower elevations.

Lead, chromium and the polychlorinated biphenyl Anachlor-1260, were detected at levels below cleanup criteria established by Title 22 of the California Code of Regulations (CCR). Similarly these compounds appear topical and quickly diminishes at lower elevations.

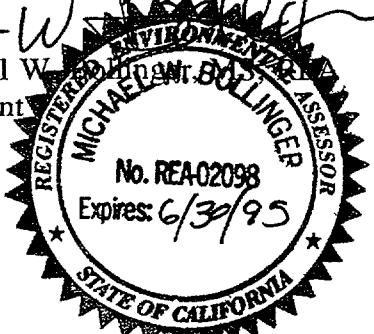
Volatile organic compounds of acetone, benzene, 2-butanone, ethylbenzene, tetrachloroethene, 1,1,1-trichloroethane, toluene and xylenes were detected in various samples at concentrations ranging from 5 to 7,500 µg/Kg. Concentrations also quickly diminishes at lower elevations and were only detected in three (3) borings below 6-feet bgs.

It is indicated that the large majority of contaminants detected during this investigation are located in shallow soil strata. Thus, impacted soil could be easily mitigated through surface excavation. Areas exhibiting contamination at relatively deeper elevations could then be identified, isolated, and individually excavated.

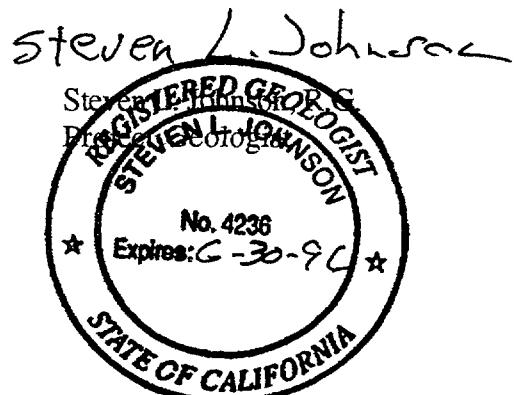
Presented in this Site Assessment Report are the field procedures and rationale implemented to evaluate the site and potential impact from the subject tanks. Pertinent supporting data, including field measurements and certified laboratory analyses are included for reference.

Reviewed and Approved By:  
**GEOLOGICAL RESEARCH COMPANY**

Michael W. Johnson  
President



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## **2.0 INTRODUCTION AND BACKGROUND**

Presented in this Site Assessment Report are the procedures and rationale employed to investigate general subsurface soil conditions at the Dico Oil Facility located at 1845 Willow Street, in the city of Signal Hill, California. The location of the site is shown by Map A on the following page.

### **2.1 Site History and Description**

The city of Signal Hill is situated in the southern most reaches of Los Angeles County. It is bordered on all sides by the city of Long Beach. Nearly all of the city lies within the Signal Hill Oil Field District. The Dico Oil facility operates on a 0.5-acre parcel of land in an area that is predominately utilized for commercial and oil field operations. However, there are two (2) residences adjoining the subject facility at its eastern boundary.

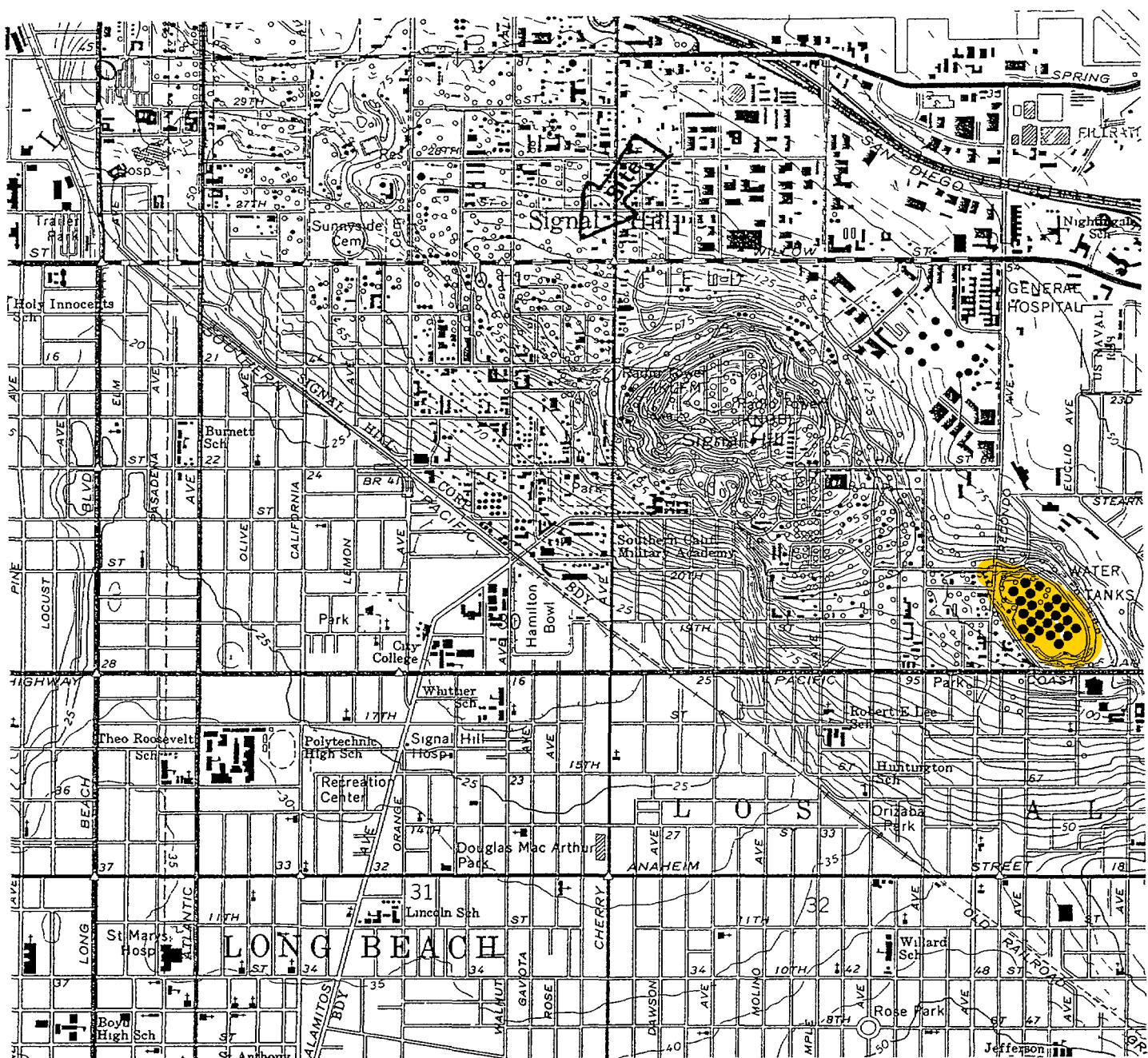
The facility was originally built as a petroleum storage and dehydration facility by TCL Corporation in 1952. It has been in continuous operation since its inception and has been operated by three (3) different companies: the TCL Corporation (1952 - 1958); the Western Oil Reduction Company (1958 - 1960); and finally the Dico Oil Company (1960 to present).

Dico Oil Company operates the facility by purchasing and blending various types of waste oils for resale. The facility has a history of handling crude oils; residual and cracked fuel oils; diesel fuels; jet fuels; asphalt emulsions; and waste or used oils. However, in recent years the predominant oil types that Dico receives are waste and used oil. The Dico facility purchases and resells approximately 2,000,000-gallons of waste oil per year. The facility includes six (6) above-ground steel, storage tanks of the following sizes:

<u>Quantity</u>	<u>Size in Barrels</u>	<u>Size in Gallons</u>
1	200	8,400
3	500	21,000
1	750	31,500
1	1,000	42,000

The storage tanks have been in continuous use since installation in 1952. Dehydration activities are no longer conducted at the facility. Rather, oils are analyzed on-site for approximate water content and must satisfy water content standards prior to off-loading. Oils of varying water and sediment content are then blended to achieve the most economical combinations for resale. Nothing is added or removed from the waste oil, it is simply blended. The recycled oil is then sold through brokers to the bunker oil market as ship fuel.

The entire area containing the tanks and related pumps and piping is surrounded by an earthen containment berm approximately 2 to 3-feet high. The berm is covered with plastic sheeting. Figure 2 on the following page shows an approximate site layout plan.



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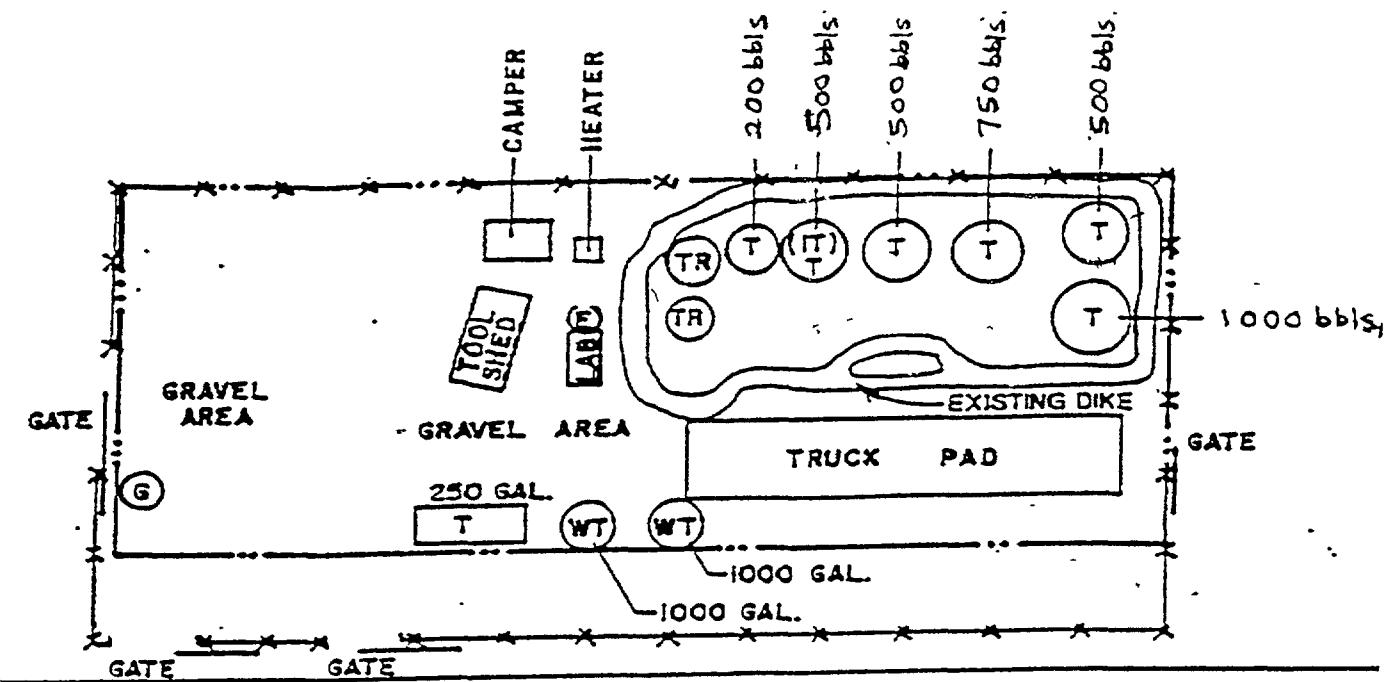
## MAP A

SCALE: 1 inch = 2000feet



## SITE LOCATION





—\*—\*— 6' Chain Link Fence

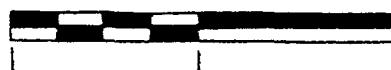
- (E) Electrical Connection/Shutoff
- (G) Gas Connection, Shutoff
- ( ) Above Ground Tank (solid line)
- GAL. Capacity in gallons
- T Waste Stored
- (IT) Insulated Tank
- WT Water Tank
- TR Empty Tanks Removed From Site



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FIGURE 2

SCALE: Not To Scale



SITE PLAN



## **2.2 Results of Previous Investigations**

Previous studies completed for the site (Ecology and Environment, Inc. 1990) indicated that two (2), 10,500-gallon underground storage tanks used for water collected during dehydration operations were excavated and removed from the site in 1987. Reports indicate that the soil was impacted with petroleum hydrocarbons beneath the tanks at a level of 945.3 mg/Kg. Dico removed an additional 4-feet of soil from the tank excavation and stockpiled it on-site. The resultant excavation was reportedly backfilled to grade with clean fill material imported to the site.

Reports indicate that the stockpiled soil was utilized in 1989 to increase the berm height. Testing of soil placed onto the berm indicated elevated levels of Petroleum Hydrocarbons (44,000 mg/Kg), Lead (340 mg/Kg) and Chromium (37 mg/Kg).

Reported testing of stored waste oil at the facility (Ecology and Environment, Inc. 1990) also indicated elevated levels of Lead and Polychlorinated Biphenyls (PCB's).

## **3.0 SITE GEOLOGY AND HYDROGEOLOGY**

### **3.1 Site Geology**

The site is located at approximately 125-feet above mean sea level (AMSL) on the Western portion of the Downey Plain Physiographic Unit of the Los Angeles Coastal Basin. This region occupies the Northwest corner of the Peninsular Range Geomorphic Province. The plain is part of a deep northwest trending incline about 20-miles in width. The synclinal structure is bounded to the northeast by the Puente Hills and the Whittier Fault Zone. The southwestern boundary is created by the Newport-Inglewood Alignment of Faults and Folds.

The Downey Plain was created through alluvial deposits coalesced by the Los Angeles, Rio Hondo and San Gabriel River systems. It is part of the Pleistocene Lakewood Formation, a structure created 2 million years ago during the Pleistocene Epoch of the Quaternary Period. The Lakewood Formation deposits are composed of interbedded clay, silt, sand and gravel. It includes terrace deposits and upper Pleistocene alluvial deposits. The Lakewood Formation has a base elevation of 100 feet below mean sea level and is approximately 200 feet thick below the subject property.

The Long Beach 7½-minute quadrangle map (U.S. Geological Survey, 1981) shows a topographic grade across the site at a ratio of approximately 1:40. Drainage for the property is north towards 27th Street and then east towards Cherry Avenue storm drains.

### **3.2 Site Hydrogeology**

The Dico facility is situated on the southern reaches of the Central Water Basin. The southern boundary of the Central Water Basin is delineated by the Newport-Inglewood Fault Zone. Beneath the site, the Bellflower aquiclude and the Gage aquifer occur in the Lakewood Formation. The Bellflower aquiclude occurs at the ground surface and extends downward beneath the site to 105-feet where it meets the Gage Aquifer. This zone contains primarily clay, silt and sandy silt.

The Gage Aquifer extends from 105-feet to approximately 175-feet and is composed of fine grained sand and silty sand. It follows a fairly uniform strata approximately 50 feet thick. The Gage Aquifer marks the lower most limits of the Lakewood Formation. Underlying the Lakewood Formation is the San Pedro Formation of the Lower Pleistocene Age. Contained within the San Pedro Formation are the Hollydale, Jefferson, Lynwood, Silverado and Sunnyside aquifers.

Beneath the site the Gage aquifer interconnects with the Hollydale, Jefferson, and Lynwood aquifers. These aquifers extend from 175-feet to approximately 300-feet. They are comprised primarily of sand and gravel with some areas of silt and clay. The Silverado aquifer extends from approximately 400 to 600-feet. The Sunnyside aquifer extends approximately from 650 to

950-feet.

The Newport Inglewood Fault splits these aquifers near this region and creates a separation of the West Coast Water Basin from the Central Water Basin. Some studies indicate that this fault creates a groundwater barrier in the Lower Pleistocene Age Formation (Lynwood and Silverado Aquifers). This barrier effect is not believed to occur in the Lakewood Formation (Bellflower Aquiclude and Gage Aquifer).

The flow of groundwater in the general area is reported to be in a Southwesterly direction. However, some indications suggests that the Newport-Inglewood Fault Zone may act somewhat as a barrier and could greatly influence actual flow direction. Various perched aquifers may occur in upper alluvial deposits below The Signal Hill Mound. However, they are reported to be isolated and no information regarding perched zones is available for the subject area.

The nearest drinking water well is located approximately 1-mile due east of the Dico Facility. The well is identified as Citizen 7A Well and is owned by the Long Beach Water District (LBWD). According to LBWD, the well is perforated starting at 300-feet and extends to 898-feet. Thus it appears that this well draws water from the Lynwood, Silverado, and Sunnyside aquifers. LBWD blends 45% ground water and 55% water from the Metropolitan Water District for distribution for potable and commercial needs.

The subject site is situated approximately 2-miles west of the Los Angeles River and 3-miles north of the Pacific Ocean. There are no other known water courses or channels located in the immediate area. The site is not located within any documented flood plain.

## **4.0 FIELD ACTIVITIES**

The general objective of the investigation was to implement an investigative field program to evaluate the potential for subsurface contamination relating to the subject waste oil storage tanks at the site. The investigation included measures to complete eight (8) exploratory borings with representative soil sample collection, laboratory analyses, and Preparation of Site Investigation Report.

### **4.1 Pre-Drilling Activities and Permitting**

Prior to commencement of field activities, Geological Research cleared boring locations of subsurface obstructions through use of a utility locating service. Local offices of the DIG-ALERT information network were also notified of the pending drilling and asked for assistance with utility locations. DIG-ALERT project #739620 was assigned to the site.

A site-specific Health and Safety Plan relating to pertinent field precautions and emergency course-of-action was prepared and submitted to each staff member and subcontractor engaged in field activities. Each individual reviewing this document was asked to acknowledge their understanding of the procedures by signing and dating the master copy. This document will remain in Geological Research files for any future reference.

### **4.2 Rationale for Sampling Locations and Depth**

Eight (8) exploratory borings were drilled in locations designed to provide data representing in-situ conditions surrounding the existing storage tanks. This included locations away from the subject tanks in areas approximately 3-feet lower in elevation than the tank grade. Historical information provided for the site indicated surface contamination at the site extended downward to an elevation of approximately 3-feet below ground surface (bgs). Further sampling indicated little or no petroleum constituents at 6-feet bgs. Therefore, total maximum depth for each boring was designed to be approximately 9-feet bgs. Sample collection was designed to be at elevations of 3, 6, and 9-feet bgs. This would provide comparative analyses of previous sampling results of the 3 and 6-feet bgs elevations and would additionally provide data at 9-feet bgs elevation to better evaluate vertical involvement. Approximate locations of the borings are shown in Figure 3 on the following page.

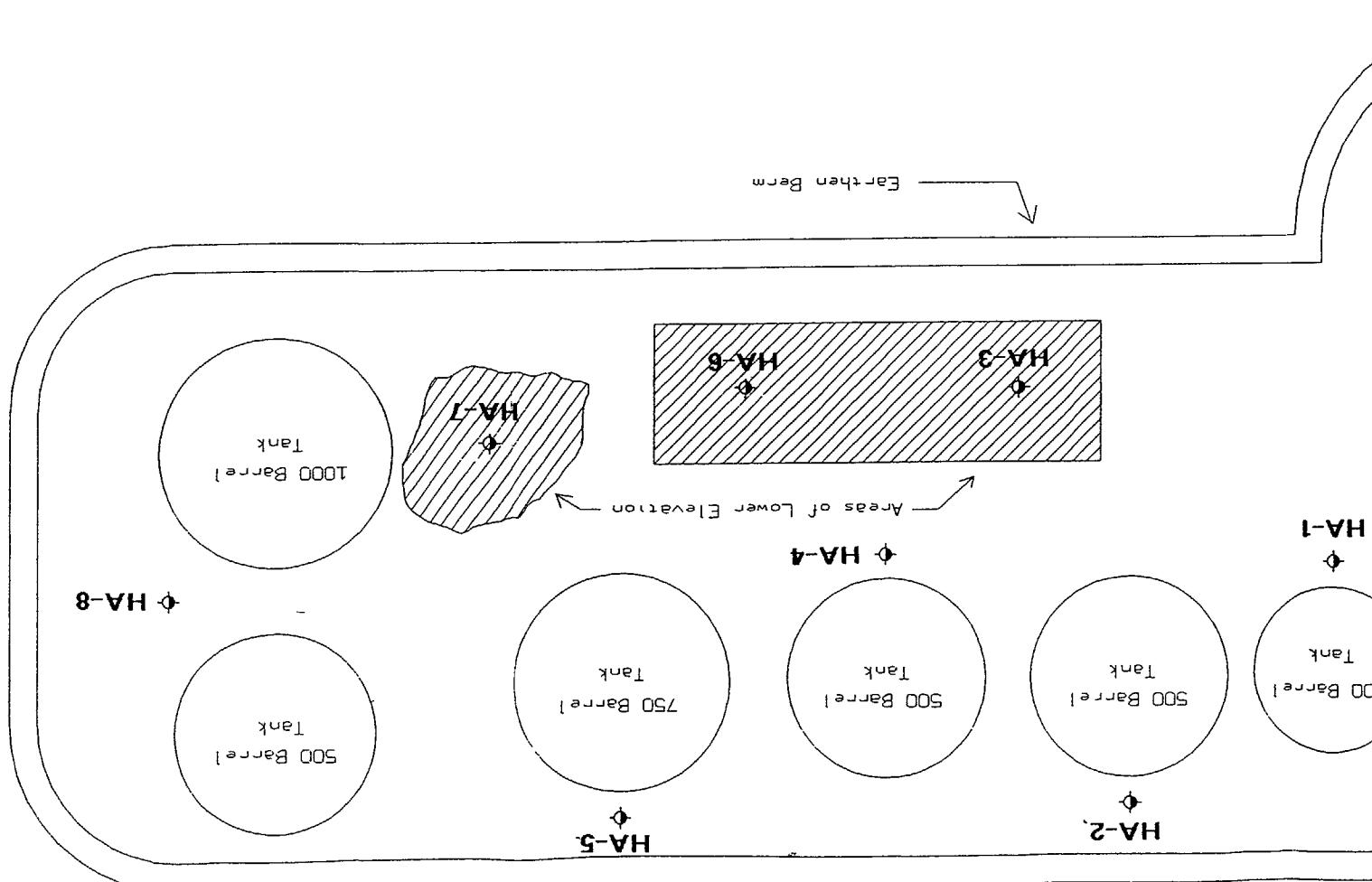
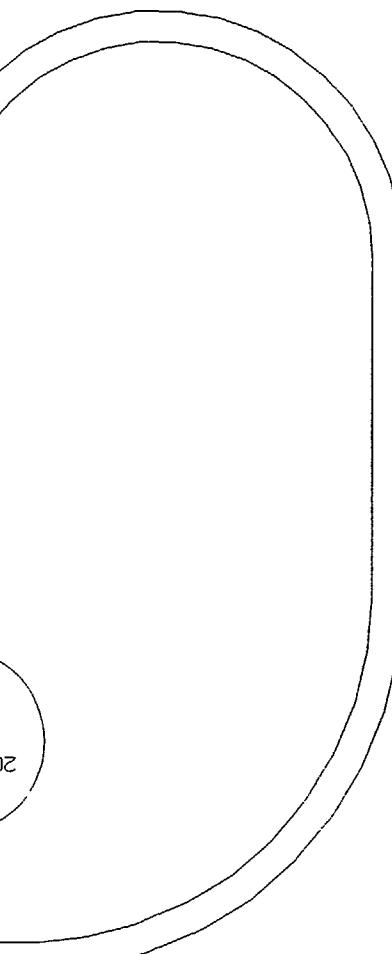
### **4.3 Drilling and Soil Sampling Protocol**

The eight (8) exploratory borings were completed by using conventional hand-auger equipment on September 20 and 21, 1994. Soil samples were collected by means of a slidehammer-equipped sampling probe fitted with a 2" X 6" brass sample collection sleeve. Soils encountered throughout drilling activities were logged in the field under the supervision of a California State

HA-# = SOIL BORING LOCATION

SCALE: 1inch = 25feet  
0 25 50

2



### LOCATIONS OF SOIL BORINGS

DICO OIL COMPANY  
1845 EAST WILLOW STREET  
SIGNAL HILL, CALIFORNIA

FIGURE  
3

Registered Geologist and categorized in accordance with Unified Soil Classification System (USCS) guidelines.

In addition to laboratory submittal requirements, collected soil samples were utilized to examine subsurface geology and to field screen for volatile organic compound levels.<sup>1</sup> The contents of each sample sleeve were visually inspected to detect any gross contamination. Portions of soil cuttings retrieved from each depth were placed into sealed plastic bags for organic vapor screening utilizing an Environmental Instruments Model #510-D Photoionization Detector (PID). Pertinent field observations and measurements were recorded on field boring logs for each individual boring completed throughout drilling activities. Elements recorded included:

- Time the soil sample was taken
- Sample depth interval
- TOV measurements taken on sample
- Sample description and USCS classification
- Any other relevant observations

Samples for laboratory analyses were selected based on field observations including visual inspection and field screening measurements. Sleeves containing samples selected for laboratory analyses were sealed with teflon tape, fitted with air-tight end caps, secured with non-adhesive tape, labeled and stored on "blue-ice" awaiting transfer to the contract laboratory.

Soils encountered were typically unconsolidated fill and gravel near the surface and fine sandy silt occurring below approximately 1-foot bgs. Following completion of the borings and sample retrieval, each bore hole was backfilled with environmentally approved bentonite pellets and hydrated per manufactures recommendations. Soil cuttings generated during field activities were placed into DOT-approved 55-gallon drums, sealed and labeled. These soil cuttings will remain on-site until final laboratory analyses and soil characterization has been completed to confirm proper disposal methods.

#### **4.4 Quality Assurance/Quality Control**

Quality Assurance/Quality Control (QA/QC) procedures encompass the collection and preservation of samples as well as decontamination of sampling equipment. Sampling equipment was decontaminated using the following procedures:

- A decontamination station was set up in a secure area of the site located near a water supply. Plastic sheeting was placed on the ground surface under the wash basins.
- Step 1 - Each item thoroughly rinsed in tap water and scrub with stiff brush to remove loose soil.
- Step 2 - Each item thoroughly re-rinsed in tap water.

- Step 3 - Each item thoroughly washed in a solution of tap water and Alconox detergent utilizing brushes to wash the outside and inside of the auger and soil sampler.
- Step 4 - Each item thoroughly rinsed in tap water.
- Step 5 - Each item rinsed in purified distilled water.
- Step 6 - Each item re-rinsed in purified deionized water.
- Step 7 - All items allowed to air-dry.

At the conclusion of each workday, all decontamination solutions were transferred into DOT-approved 55-gallon drums, labeled and stored on-site. Disposal of investigation-derived waste water will be dependent on final laboratory analyses.

The management of samples collected in the field follow specific procedures to ensure sample integrity. The possession of samples is traceable from the time they are collected to the time they are analyzed at the contract laboratory by means of Chain-of-Custody documentation.

Chain-of-custody of a sample is defined by the following criteria:

- The sample is in a person's possession or in his view after being in his possession.
- The sample was in a person's possession and was locked up or transferred to a designated secure area by him.

Each time the sample sleeves or containers changed hands, both the sender and receiver signed and dated the chain-of-custody form and specified what item(s) have changed hands. When a sample shipment was sent to the laboratory, the top signature copy was enclosed in plastic with the sample documentation and secured to the inside of the cooler lid. The second copy of the chain-of-custody form was retained in the project files. A chain-of-custody record was completed for each shipping container.

The following information was included in the chain-of-custody form.

- Sample number
- Signature of sampler
- Date and time of collection
- Place of collection
- Type of sample
- Number and type of container
- Inclusive dates of possession

- Signature of receiver

Copies of Chain-of-Custody documents and laboratory QA/QC information are contained with copies of laboratory analyses results in the Appendix.

## **5.0 LABORATORY ANALYSES**

Soil samples collected during the investigation were submitted to Core Laboratory in Anaheim, California for analyses. Core Laboratories is a California State Accredited Laboratory with specific environmental analyses expertise.

### **5.1 Rationale for Sample Analyses Methods**

Site history indicates that the existing above ground storage tanks were utilized to contain crude oils, residual fuel oils, cracked fuel oils, diesel fuels, jet fuels, asphalt emulsions, waste oil and used oils. Additionally, previous investigations conducted at the facility indicate the presence of toxic metals and Polychlorinated Biphenyls. Therefore, it was determined that samples would be analyzed utilizing the following methodology:

- EPA Method 8015 for Fuel Hydrocarbon Characterization
- EPA Method 6010 for total arsenic, cadmium, chromium, and lead
- EPA Method 8080 for polychlorinated biphenyls (PCB's)
- EPA Method 8240 for Volatile Organic Compounds

The selected EPA Method 8015 specifically address the presence of petroleum hydrocarbon based fuels. EPA Method 6010 will identify the toxic metal content associated with petroleum products. The possible presence of PCB's will be adequately addressed by EPA Method 8080. A wide range of volatile organic solvents that may be present through associated use with oil cleanup activities will be appropriately addressed by EPA 8240.

The potential for the presence of other compounds has not been established for the site. Nor does encroachment or migration of compounds from adjoining areas seem plausible. Therefore, testing for analytes other than those presented is not warranted at this time.

### **5.2 Sample Analyses Results**

The only petroleum derived fuel detected during the investigation was diesel fuel in concentrations ranging to 10,000 mg/Kg at 3-feet bgs. It however quickly diminishes at lower elevations and was only detected in boring HA-5 below 6-feet bgs.

Lead was detected in a single sample of 5.7 mg/Kg at 6-feet bgs in boring HA-1. Chromium was detected at various elevations in four (4) borings (HA-2, 5, 7, and 8) at concentrations ranging from 5.2 to 7.9 mg/Kg.

The polychlorinated biphenyl Anachlor-1260 was detected in borings HA-1, 2, 3, 5, and 8 in concentrations ranging from 44 to 4,500 µg/Kg.

Volatile organic compounds of acetone, benzene, 2-butanone, ethylbenzene, tetrachloroethene, 1,1,1-trichloroethane, toluene and xylenes were detected in various samples at concentrations ranging from 5 to 7,500 µg/Kg. They however quickly diminishes at lower elevations and were only detected in borings HA-1, 5 and 8 below 6-feet bgs.

Tables 1 on the following page summarizes the results of soil samples. Copies of certified laboratory results are contained in the appendix for reference.

**TABLE 1**  
**SUMMARY OF LABORATORY RESULTS**

	HA-1			HA-2			HA-3			HA-4		
	3-ft bgs	6-ft bgs	9-ft bgs	3-ft bgs	6-ft bgs	9-ft bgs	3-ft bgs	6-ft bgs	9-ft bgs	3-ft bgs	6-ft bgs	9-ft bgs
TPH EPA METHOD 6015 (mg/Kg)												
Diesel		12		160			100			1100	11	
METALS EPA 6010 (mg/Kg)							89					
Chromium												
Lead		57										
PCB'S EPA 8080 (ug/Kg)												
Aroclor-1260		51	66	250	89		44					
VOLATILES EPA 8240 (ug/Kg)												
Acetone					18					98	33	
Benzene	33											
2-Butanone										51		
Ethylbenzene										570	33	
Tetrachloroethene				5						110	8	
1,1,1-Trichloroethane										52		
Toluene	230	11	24		6					1400	69	
Total Xylenes	7500	33	100		17					2900	250	

	HA-5			HA-6			HA-7			HA-8		
	3-ft bgs	6-ft bgs	9-ft bgs	3-ft bgs	6-ft bgs	9-ft bgs	3-ft bgs	6-ft bgs	9-ft bgs	3-ft bgs	6-ft bgs	9-ft bgs
TPH EPA METHOD 6015 (mg/Kg)												
Diesel	10000	1300	790								1800	
METALS EPA 6010 (mg/Kg)												
Chromium			52				75				54	
Lead												
PCB'S EPA 8080 (ug/Kg)												
Aroclor-1269	1500	200								4500	410	2600
VOLATILES EPA 8240 (ug/Kg)												
Acetone	220	260	98									95
Benzene	48											
2-Butanone												
Ethylbenzene												
Tetrachloroethene										190		
1,1,1-Trichloroethane												
Toluene		56								230		
Total Xylenes		350								1100	150	67

## 6.0 CONCLUSIONS AND RECOMMENDATIONS

Results of laboratory analyses indicates that the only petroleum derived fuel detected during the investigation was diesel fuel. It however appears topical and quickly diminishes at lower elevations with a single detection in boring HA-5 below 6-feet bgs at 790 ppm. Thus it appears to be localized and could be easily mitigated through surface excavation.

The detection of lead and chromium are at levels below cleanup criteria established by Title 22 of the California Code of Regulations (CCR). It should therefore pose little risk with a majority of this material removed in a surface excavation.

The polychlorinated biphenyl Anachlor-1260 was detected in only two samples (2) samples below 6-feet bgs (borings HA-1 and HA-8). It, however, is below cleanup levels of 5-ppm as established by Title 22 CCR for all samples. It therefore should pose little risk with a majority of the material removed during a surface excavation.

Volatile organic compounds of acetone, benzene, 2-butanone, ethylbenzene, tetrachloroethene, 1,1,1-trichloroethane, toluene and xylenes were detected in various samples at concentrations ranging from 5 to 7,500 µg/Kg. Concentrations however quickly diminishes at lower elevations and were only detected in borings HA-1, 5 and 8 below 6-feet bgs. The majority of these compounds would also be largely mitigated during a surface excavation. "Hot-Spots" at deeper elevations could then be isolated and excavated to clean soil margins.

It is indicated that the large majority of contaminants detected during this investigation are located in shallow soil strata. Thus, impacted soil could be easily mitigated through surface excavation. Areas exhibiting contamination at relatively deeper elevations could then be identified and individually excavated. If such mitigative excavation activities are undertaken, design and planning efforts must be initiated to employ methodology to safeguard the surrounding environment. This should include measures for worker protection, vapor suppression, dust suppression and efficient disposal methods.

It is possible that variations in soil conditions could exist beyond the points explored in this and previous investigations. Additionally, unpermitted, undocumented, concealed appurtenance upon the property could exist beyond the scope addressed during the course of this investigation. Also, changes in the conditions found and reported herein could occur due to variations in rainfall, temperature or other factors. Results and opinions presented herein do not apply to any area or apparatus other than the completed boring locations.

This Environmental Site Assessment was performed in accordance with generally and currently accepted engineering practices and principles. The conclusions made in this report are based on and in accordance with information obtained from visual observations made throughout the investigation process, laboratory analyses, and information obtained from Federal, State, regional and local agencies. Although **Geological Research** believes that the information contained herein is reliable, no guarantee is made as to the accuracy of the information provided to **Geological**

**Research** by others. This report was prepared for the sole use of **Dico Oil Company**.

Although **Geological Research** consents to the release of this report to third parties at the discretion of **Dico Oil Company**, **Geological Research** makes no warranty of any kind to third parties and cannot be held liable for any reliance by third parties upon the information contained herein. No other warranty is expressed or implied.

## 7.0 REFERENCES

California Department of Health Services (DHS), January 1989: Revised Expenditure Plan for the Hazardous Substances Clean Up Bond Act of 1984.

DHS, December 1988(a): Revised Expenditure Plan for the Hazardous Substances Clean Up Bond Act of 1984.

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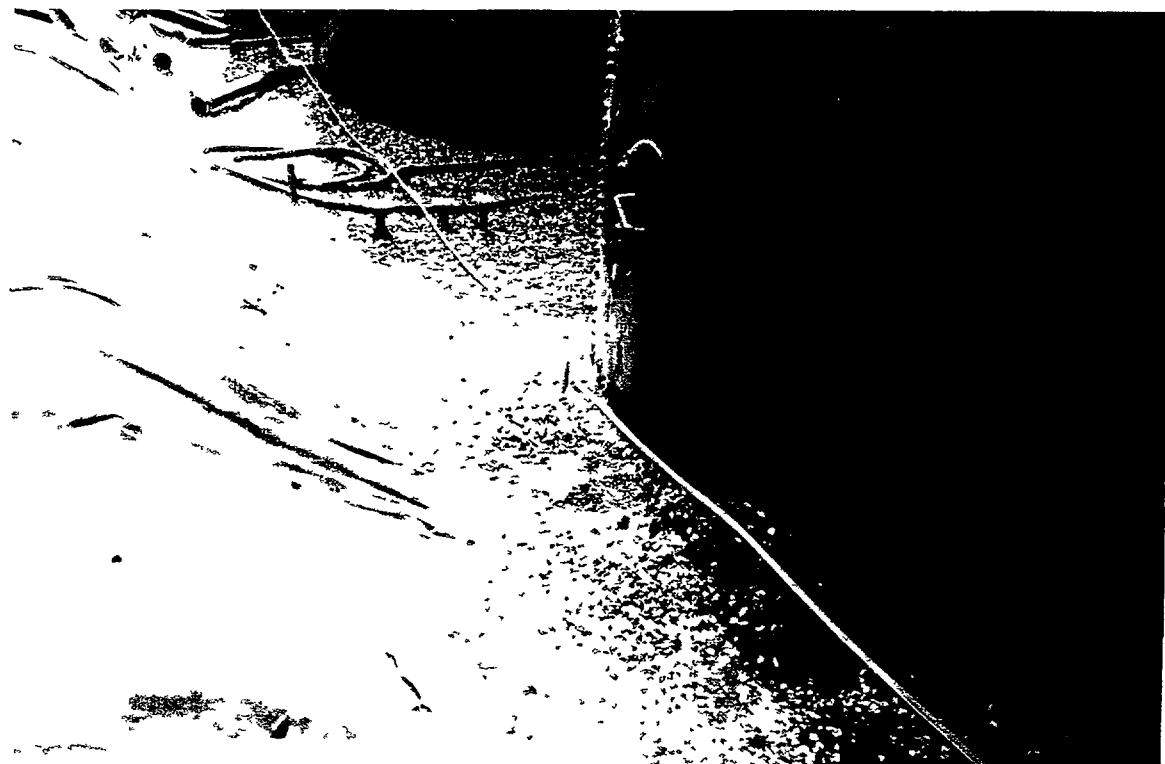
**View of East Portion of the Tank Farm  
Looking Towards the South**



**View of West Portion of the Tank Farm  
Looking towards the South**



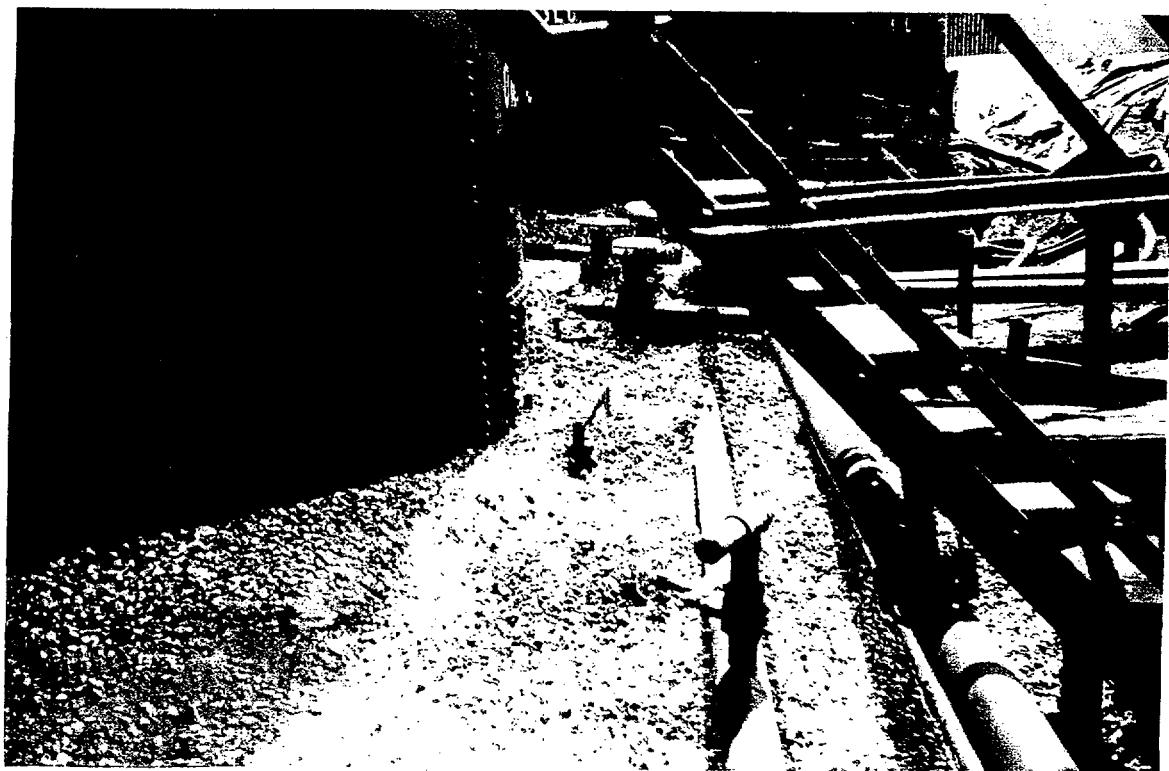
**View of Boring HA-1 Location**



**View of Boring HA-2 Location**



**View of Boring HA-3 Location**



**View of Boring HA-4 Location**



**View of Boring HA-5 Location**



**View of Boring HA-6 Location**



**View of Boring HA-7 Location**



**View of Boring HA-8 Location**

**Exhibit 2**  
**Laboratory Analyses Results**



## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

JOB NUMBER	CUSTOMER	TESTS	RESULTS	ATTN.	DET. PAPER
942323	OTECO OIL CO./Advanced Resources				
CLIENT I.D.....		LABORATORY I.D....:	942323-0001		
DATE SAMPLED.....	09/20/94	DATE RECEIVED....:	09/21/94		
TIME SAMPLED.....	12:35	TIME RECEIVED....:	12:35		
WORK DESCRIPTION...:	HA-1-3!	REMARKS.....	1 brssly-soil		
TEST DESCRIPTION	TEST RESULT	LIMIT/EXCUTION	UNITS OF MEASURE	TEST METHOD	DATE
Acid Digestion for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94
Sonication Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/22/94
Volatile Organics by GC/MS		*5		EPA 8240	09/22/94
Acetone	ND	50	ug/kg	EPA 8240	
Benzene	33	25	ug/kg	EPA 8240	
Bromodichloromethane	ND	25	ug/kg	EPA 8240	
Bromoform	ND	25	ug/kg	EPA 8240	
Bromomethane	ND	50	ug/kg	EPA 8240	
2-Butanone	ND	50	ug/kg	EPA 8240	
Carbon disulfide	ND	25	ug/kg	EPA 8240	
Carbon tetrachloride	ND	25	ug/kg	EPA 8240	
Chlorobenzene	ND	25	ug/kg	EPA 8240	
Chlorodibromomethane	ND	25	ug/kg	EPA 8240	
Chloroethane	ND	50	ug/kg	EPA 8240	
2-Chloroethylvinyl ether	ND	50	ug/kg	EPA 8240	
Chloroform	ND	25	ug/kg	EPA 8240	
Chlormethane	ND	50	ug/kg	EPA 8240	
1,1-Dichloroethane	ND	25	ug/kg	EPA 8240	
1,2-Dichloroethane	ND	25	ug/kg	EPA 8240	
1,1-Dichloroethene	ND	25	ug/kg	EPA 8240	
Total 1,2-Dichloroethenes	ND	25	ug/kg	EPA 8240	
1,2-Dichloropropene	ND	25	ug/kg	EPA 8240	
cis-1,3-Dichloropropene	ND	25	ug/kg	EPA 8240	
trans-1,3-Dichloropropene	ND	25	ug/kg	EPA 8240	
Ethylbenzene	ND	25	ug/kg	EPA 8240	
2-Hexanone	ND	50	ug/kg	EPA 8240	
Methylene Chloride	ND	25	ug/kg	EPA 8240	
4-Methyl-2-pentanone	ND	50	ug/kg	EPA 8240	
Styrene	ND	25	ug/kg	EPA 8240	
1,1,2,2-Tetrachloroethane	ND	25	ug/kg	EPA 8240	
Tetrachloroethene	ND	25	ug/kg	EPA 8240	
1,1,1-Trichloroethane	ND	25	ug/kg	EPA 8240	
1,1,2-Trichloroethane	ND	25	ug/kg	EPA 8240	
Trichloroethene	ND	25	ug/kg	EPA 8240	
Toluene	230	25	ug/kg	EPA 8240	
Vinyl acetate	ND	50	ug/kg	EPA 8240	
Vinyl chloride	ND	50	ug/kg	EPA 8240	
Total Xylenes	7500	25	ug/kg	EPA 8240	
d4-Dichloroethane (SURROGATE)	102	0	% Recovery	70-121% QC LIMITS	
d8-Toluene (SURROGATE)	115(a)	0	% Recovery	88-110% QC LIMITS	
4-Bromofluorobenzene (SURROGATE)	190(a)	0	% Recovery	74-121% QC LIMITS	

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## Core Laboratories

LABORATORY TESTS RESULTS  
09/23/94

NUMBER: 942323 CUSTOMER: OIL &amp; GAS COR//Advanced Resources

ATTN: Dan Parker

I.D.....: 942323  
AMPLED....: 09/20/94  
AMPLED....: 12:35  
DESCRIPTION...: HA-1-3'LABORATORY I.D....: 942323-0001  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brssly-soil

DESCRIPTION	FINAL RESULT	LIMIT/REDUCTION	UNITS OF MEASURE	TEST METHOD	DATE	VERIF.
Petroleum Hydrocarbons		*7		EPA 8015 (modified)	09/22/94	RVJ
As	ND	50	mg/kg	EPA 8015 (modified)		
		*100		EPA 6010	09/22/94	VB
meric (As)	ND	30.0	mg/kg	EPA 6010		
dmium (Cd)	ND	5.00	mg/kg	EPA 6010		
romium (Cr)	ND	5.00	mg/kg	EPA 6010		
ad (Pb)	ND	5.00	mg/kg	EPA 6010		
Hydrocarbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
Iorinated Biphenyls		*20		EPA 8080	09/22/94	CIS
oclor-1016	ND	660	ug/kg	EPA 8080		
oclor-1221	ND	660	ug/kg	EPA 8080		
oclor-1232	ND	660	ug/kg	EPA 8080		
oclor-1242	ND	660	ug/kg	EPA 8080		
oclor-1248	ND	660	ug/kg	EPA 8080		
oclor-1254	ND	660	ug/kg	EPA 8080		
oclor-1260	ND	660	ug/kg	EPA 8080		
trachloro-m-xylene (SURROGATE)	83	0	% Recovery	QC LIMITS 40-130		

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## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

JOB NUMBER: 092323-0002 CUSTOMER: DICO OIL Co./Advanced Resources ATTN: Dale Parr

CLIENT I.D.....  
DATE SAMPLED....: 09/20/94  
TIME SAMPLED....: 13:00  
WORK DESCRIPTION...: HA-1-6'

LABORATORY I.D....: 942323-0002  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brsslv-soil

TEST DESCRIPTION	FINAL RESULT	LIMITS/DEFINITION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN.
Acid Digestion for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EAW
Sonication Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/22/94	DC
Volatile Organics by GC/MS		*1		EPA 8240	09/22/94	CIS
Acetone	ND	10	ug/kg	EPA 8240		
Benzene	ND	5	ug/kg	EPA 8240		
Bromodichloromethane	ND	5	ug/kg	EPA 8240		
Bromoform	ND	5	ug/kg	EPA 8240		
Bromomethane	ND	10	ug/kg	EPA 8240		
2-Butanone	ND	10	ug/kg	EPA 8240		
Carbon disulfide	ND	5	ug/kg	EPA 8240		
Carbon tetrachloride	ND	5	ug/kg	EPA 8240		
Chlorobenzene	ND	5	ug/kg	EPA 8240		
Chlorodibromomethane	ND	5	ug/kg	EPA 8240		
Chloroethane	ND	10	ug/kg	EPA 8240		
2-Chloroethylvinyl ether	ND	10	ug/kg	EPA 8240		
Chloroform	ND	5	ug/kg	EPA 8240		
Chloromethane	ND	10	ug/kg	EPA 8240		
1,1-Dichloroethane	ND	5	ug/kg	EPA 8240		
1,2-Dichloroethane	ND	3	ug/kg	EPA 8240		
1,1-Dichloroethene	ND	5	ug/kg	EPA 8240		
Total 1,2-Dichloroethenes	ND	5	ug/kg	EPA 8240		
1,2-Dichloropropane	ND	5	ug/kg	EPA 8240		
cis-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
trans-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
Ethylbenzene	ND	5	ug/kg	EPA 8240		
2-Hexanone	ND	10	ug/kg	EPA 8240		
Methylene Chloride	ND	5	ug/kg	EPA 8240		
4-Methyl-2-pentanone	ND	10	ug/kg	EPA 8240		
Styrene	ND	5	ug/kg	EPA 8240		
1,1,2,2-Tetrachloroethane	ND	5	ug/kg	EPA 8240		
Tetrachloroethene	ND	5	ug/kg	EPA 8240		
1,1,1-Trichloroethane	ND	5	ug/kg	EPA 8240		
1,1,2-Trichloroethane	ND	5	ug/kg	EPA 8240		
Trichloroethene	ND	5	ug/kg	EPA 8240		
Toluene	11	5	ug/kg	EPA 8240		
Vinyl acetate	ND	10	ug/kg	EPA 8240		
Vinyl chloride	ND	10	ug/kg	EPA 8240		
Total Xylenes	33	5	ug/kg	EPA 8240		
d4-Dichloroethane (SURROGATE)	89	0	% Recovery	70-121% QC LIMITS		
d8-Toluene (SURROGATE)	105	0	% Recovery	88-110% QC LIMITS		
4-Bromofluorobenzene (SURROGATE)	106	0	% Recovery	74-121% QC LIMITS		

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## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

JOB NUMBER: 942263 CUSTOMER: OIL & OIL Co./Advanced Resources ATTN: Del Parker

CLIENT I.D.....  
DATE SAMPLED....: 09/20/94  
TIME SAMPLED....: 13:00  
WORK DESCRIPTION...: HA-1-6'

LABORATORY I.D....: 942323-0002  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brssly-soil

TEST DESCRIPTION	FINAL RESULT	LIMITS/DETECTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
Total Petroleum Hydrocarbons		*1		EPA 8015 (modified)	09/22/94	RVJ
Diesel	12	10	mg/kg	EPA 8015 (modified)		
Metals		*100		EPA 6010	09/22/94	V8
Arsenic (As)	ND	30.0	mg/kg	EPA 6010		
Cadmium (Cd)	ND	5.00	mg/kg	EPA 6010		
Chromium (Cr)	ND	5.00	mg/kg	EPA 6010		
Lead (Pb)	5.7	5.00	mg/kg	EPA 6010		
Total Hydrocarbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
Polychlorinated Biphenyls		*1		EPA 8080	09/22/94	CIS
Aroclor-1016	ND	33	ug/kg	EPA 8080		
Aroclor-1221	ND	33	ug/kg	EPA 8080		
Aroclor-1232	ND	33	ug/kg	EPA 8080		
Aroclor-1242	ND	33	ug/kg	EPA 8080		
Aroclor-1248	ND	33	ug/kg	EPA 8080		
Aroclor-1254	ND	33	ug/kg	EPA 8080		
Aroclor-1260	51	33	ug/kg	EPA 8080		
Tetrachloro-m-xylene (SURROGATE)	63	0	% Recovery	QC LIMITS 40-130		

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## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

ITEM # 942323 CUSTOMER: DICO/DIL-CO./Advanced Resources S/TN: Del Peker

I.D.....: 09/20/94  
SAMPLED....: 09/21/94  
SAMPLED....: 13:30  
DESCRIPTION...: HA-1-91

LABORATORY I.D....: 942323-0003  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brassly-soil

DESCRIPTION	FINAL RESULT	LIMITS/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHNIQUE
Digestion for ICP	COMPLETED	-----	N/A	EPA 3050	09/21/94	EW
ation Extraction for PCBs	COMPLETED	-----	N/A	EPA 3550	09/22/94	DC
ile Organics by GC/MS		*1		EPA 8240	09/22/94	CIS
zene	ND	10	ug/kg	EPA 8240		
enzen	ND	5	ug/kg	EPA 8240		
romodichloromethane	ND	5	ug/kg	EPA 8240		
romoform	ND	5	ug/kg	EPA 8240		
romomethane	ND	10	ug/kg	EPA 8240		
-Butanone	ND	10	ug/kg	EPA 8240		
arbon disulfide	ND	5	ug/kg	EPA 8240		
arbon tetrachloride	ND	5	ug/kg	EPA 8240		
lorobenzene	ND	5	ug/kg	EPA 8240		
lorodibromomethane	ND	5	ug/kg	EPA 8240		
loroethane	ND	10	ug/kg	EPA 8240		
-Chloroethylvinyl ether	ND	10	ug/kg	EPA 8240		
loroform	ND	5	ug/kg	EPA 8240		
loromethane	ND	10	ug/kg	EPA 8240		
,1-Dichloroethane	ND	5	ug/kg	EPA 8240		
,2-Dichloroethane	ND	5	ug/kg	EPA 8240		
,1-Dichloroethene	ND	5	ug/kg	EPA 8240		
otal 1,2-Dichloroethenes	ND	5	ug/kg	EPA 8240		
,2-Dichloropropane	ND	5	ug/kg	EPA 8240		
is-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
rans-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
hyllbenzene	ND	5	ug/kg	EPA 8240		
-Hexanone	ND	10	ug/kg	EPA 8240		
ethylene Chloride	ND	5	ug/kg	EPA 8240		
-Methyl-2-pentanone	ND	10	ug/kg	EPA 8240		
tyrene	ND	5	ug/kg	EPA 8240		
,1,2,2-Tetrachloroethane	ND	5	ug/kg	EPA 8240		
etrachloroethene	ND	5	ug/kg	EPA 8240		
,1,1-Trichloroethane	ND	5	ug/kg	EPA 8240		
,1,2-Trichloroethane	ND	5	ug/kg	EPA 8240		
richloroethene	ND	5	ug/kg	EPA 8240		
luene	24	5	ug/kg	EPA 8240		
inyl acetate	ND	10	ug/kg	EPA 8240		
inyl chloride	ND	10	ug/kg	EPA 8240		
otal xylenes	100	5	ug/kg	EPA 8240		
4-Dichloroethane (SURROGATE)	94	0	% Recovery	70-121% QC LIMITS		
8-Toluene (SURROGATE)	109	0	% Recovery	88-110% QC LIMITS		
-Bromofluorobenzene (SURROGATE)	132(a)	0	% Recovery	74-121% QC LIMITS		

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## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

ITEM #: 942323 CUSTOMER: DICO-DIL CO./Advanced Resources ATTN: Del Parker

I.D.....: 942323-0003  
IMPLD....: 09/20/94  
IMPLD....: 13:30  
DESCRIPTION...: HA-1-91

LABORATORY I.D...: 942323-0003  
DATE RECEIVED...: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brssly-soil

DESCRIPTION	FINAL RESULT	LIMITS/DETECTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
Petroleum Hydrocarbons		*1		EPA 8015 (modified)	09/22/94	RW
Oil	ND	10	mg/kg	EPA 8015 (modified)		
		*100		EPA 6010	09/22/94	VB
Antimony (As)	ND	30.0	mg/kg	EPA 6010		
Cadmium (Cd)	ND	5.00	mg/kg	EPA 6010		
Chromium (Cr)	ND	5.00	mg/kg	EPA 6010		
Lead (Pb)	ND	5.00	mg/kg	EPA 6010		
Hydrocarbons Extraction	COMPLETED	-----	N/A	Cal. DHS Method	09/22/94	RW
Polinated Biphenyls		*1		EPA 8080	09/22/94	CIS
chlor-1016	ND	33	ug/kg	EPA 8080		
chlor-1221	ND	33	ug/kg	EPA 8080		
chlor-1232	ND	33	ug/kg	EPA 8080		
chlor-1242	ND	33	ug/kg	EPA 8080		
chlor-1248	ND	33	ug/kg	EPA 8080		
chlor-1254	ND	33	ug/kg	EPA 8080		
chlor-1260	66	33	ug/kg	EPA 8080		
chloro-m-xylene (SURROGATE)	59	0	% Recovery	QC LIMITS 40-130		

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#019/000000



## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

CUSTOMER: DTG/CIE DOB / APPARATUS REQUESTED:

ATTN: Del Parker

NUMBER: 942323

I.D.....  
SAMPLED....: 09/20/94  
SAMPLED....: 14:05  
DESCRIPTION...: HA-2-3'

LABORATORY I.D....: 942323-0004  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brassy-soil

DESCRIPTION	FINAL RESULT	LIMITS/NOTICTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN.
Digestion for ICP	COMPLETED	-----	N/A	EPA 3050	09/21/94	EW
cation Extraction for PCBs	COMPLETED	-----	N/A	EPA 3550	09/22/94	DC
atile Organics by GC/MS		*1		EPA 8240	09/22/94	CIS
Acetone	ND	10	ug/kg	EPA 8240		
Benzene	ND	5	ug/kg	EPA 8240		
Bromodichloromethane	ND	5	ug/kg	EPA 8240		
Bromoform	ND	5	ug/kg	EPA 8240		
Bromomethane	ND	10	ug/kg	EPA 8240		
2-Butanone	ND	10	ug/kg	EPA 8240		
Carbon disulfide	ND	5	ug/kg	EPA 8240		
Carbon tetrachloride	ND	5	ug/kg	EPA 8240		
Chlorobenzene	ND	5	ug/kg	EPA 8240		
Chlorodibromomethane	ND	10	ug/kg	EPA 8240		
Chloroethane	ND	10	ug/kg	EPA 8240		
2-Chloroethylvinyl ether	ND	5	ug/kg	EPA 8240		
Chloroform	ND	10	ug/kg	EPA 8240		
Chloromethane	ND	5	ug/kg	EPA 8240		
1,1-Dichloroethane	ND	5	ug/kg	EPA 8240		
1,2-Dichloroethane	ND	5	ug/kg	EPA 8240		
1,1-Dichloroethene	ND	5	ug/kg	EPA 8240		
Total 1,2-Dichloroethenes	ND	5	ug/kg	EPA 8240		
1,2-Dichloropropane	ND	5	ug/kg	EPA 8240		
cis-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
trans-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
Ethylbenzene	ND	10	ug/kg	EPA 8240		
2-Hexanone	ND	5	ug/kg	EPA 8240		
Methylene Chloride	ND	10	ug/kg	EPA 8240		
4-Methyl-2-pentanone	ND	5	ug/kg	EPA 8240		
Styrene	ND	5	ug/kg	EPA 8240		
1,1,2,2-Tetrachloroethane	ND	5	ug/kg	EPA 8240		
Tetrachloroethene	ND	5	ug/kg	EPA 8240		
1,1,1-Trichloroethane	ND	5	ug/kg	EPA 8240		
1,1,2-Trichloroethane	ND	5	ug/kg	EPA 8240		
Trichloroethylene	ND	5	ug/kg	EPA 8240		
Toluene	ND	10	ug/kg	EPA 8240		
Vinyl acetate	ND	10	ug/kg	EPA 8240		
Vinyl chloride	ND	5	ug/kg	EPA 8240		
Total Xylenes	91	0	% Recovery	70-121% QC LIMITS		
d4-Dichloroethane (SURROGATE)	104	0	% Recovery	88-110% QC LIMITS		
d8-Toluene (SURROGATE)	101	0	% Recovery	74-121% QC LIMITS		
4-Bromofluorobenzene (SURROGATE)						

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909590761U; # 8

9-26-94 : 5:29PM

SENT BY:



Core Laboratories

LABORATORY TESTS RESULTS  
09/26/94

Job# 942323 - EDS1000X - D10-DH-CO-2/Advanced Resources - A/N - Del: Parker

LD.....: 09/20/94  
PLED.....: 09/20/94  
PLED.....: 14:05  
CRIPTION...: HA-2-3'

LABORATORY I.D....: 942323-0004  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brassy-soil

DESCRIPTION	FINAL RESULT	UNITS/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
Tot. Petroleum Hydrocarbons		*5		EPA 8015 (modified)	09/22/94	RVJ
Lead (Pb)	160	50	mg/kg	EPA 8010	09/22/94	YB
		*100				
nic (As)	ND	30.0	mg/kg	EPA 6010		
ium (Cd)	ND	5.00	mg/kg	EPA 6010		
mium (Cr)	ND	5.00	mg/kg	EPA 6010		
I (Pb)	ND	5.00	mg/kg	EPA 6010		
ydrocarbons Extraction	COMPLETED	-----	N/A	Cal. DHS Method	09/22/94	RW
minated Biphenyls		*5		EPA 8080	09/22/94	CIS
:lor-1016	ND	165	ug/kg	EPA 8080		
:lor-1221	ND	165	ug/kg	EPA 8080		
:lor-1232	ND	165	ug/kg	EPA 8080		
:lor-1242	ND	165	ug/kg	EPA 8080		
:lor-1248	ND	165	ug/kg	EPA 8080		
:lor-1254	ND	165	ug/kg	EPA 8080		
:lor-1260	250	165	ug/kg	EPA 8080		
-chloro-m-xylene (SURROGATE)	76	0	% Recovery	QC LIMITS 40-130		

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8095907810:#

CORE ANALYSIS

9-26-94 : 5:29PM :

SENT BY:



## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

ER# 942323, CUSTOMER: MTC OIL Co./Advanced Resources

ATTN: Det. Part 1

D.....  
PLED.....: 09/20/94  
PLED.....: 14:34  
CRIPTION....: HA-2-6'

LABORATORY I.D....: 942323-0005  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 bresly-soil

DESCRIPTION	FINAL RESULT	LIMITS/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECH
astion for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EAW
on Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/22/94	DC
Organics by GC/MS		*1		EPA 8240	09/22/94	CIS
one	18	10	ug/kg	EPA 8240		
ene	ND	5	ug/kg	EPA 8240		
odichloromethane	ND	5	ug/kg	EPA 8240		
oform	ND	5	ug/kg	EPA 8240		
omothane	ND	10	ug/kg	EPA 8240		
tanone	ND	10	ug/kg	EPA 8240		
on disulfide	ND	5	ug/kg	EPA 8240		
on tetrachloride	ND	5	ug/kg	EPA 8240		
robenzene	ND	5	ug/kg	EPA 8240		
ro dibromomethane	ND	5	ug/kg	EPA 8240		
roethane	ND	10	ug/kg	EPA 8240		
loroethylvinyl ether	ND	10	ug/kg	EPA 8240		
reform	ND	5	ug/kg	EPA 8240		
romethane	ND	10	ug/kg	EPA 8240		
Dichloroethane	ND	5	ug/kg	EPA 8240		
Dichloroethane	ND	5	ug/kg	EPA 8240		
Dichloroethene	ND	5	ug/kg	EPA 8240		
1,1,2-Dichloroethenes	ND	5	ug/kg	EPA 8240		
Dichloropropene	ND	5	ug/kg	EPA 8240		
1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
s-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
lbanzene	ND	5	ug/kg	EPA 8240		
xanone	ND	10	ug/kg	EPA 8240		
ylene Chloride	ND	5	ug/kg	EPA 8240		
thyl-2-pentahone	ND	10	ug/kg	EPA 8240		
ene	ND	5	ug/kg	EPA 8240		
2,2-Tetrachloroethane	ND	5	ug/kg	EPA 8240		
achloroethene	5	5	ug/kg	EPA 8240		
1-Trichloroethane	ND	5	ug/kg	EPA 8240		
2-Trichloroethane	ND	5	ug/kg	EPA 8240		
hloroethene	ND	5	ug/kg	EPA 8240		
cne	6	5	ug/kg	EPA 8240		
l acetate	ND	10	ug/kg	EPA 8240		
l chloride	ND	10	ug/kg	EPA 8240		
l Xylenes	17	5	ug/kg	EPA 8240		
ichloroethane (SURROGATE)	92	0	X Recovery	70-121% QC LIMITS		
luene (SURROGATE)	104	0	% Recovery	88-110% QC LIMITS		
omo fluoro benzene (SURROGATE)	101	0	% Recovery	74-121% QC LIMITS		

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## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

ER-52323 CUSTOMER: DFCO-DPL Co./Advanced Resources

ALIN: DEL PARREN

I.D.....  
PLED.....: 09/20/94  
PLED.....: 14:34  
CRIPTION...: NA-2-6

LABORATORY I.D....: 942323-0005  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brsslv-soil

DESCRIPTION	FINAL RESULT	LIMITS/REDUCTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
petroleum Hydrocarbons		+5		EPA 8015 (modified)	09/22/94	RVJ
z1	ND	50	mg/kg	EPA 8010 (modified)	09/22/94	VB
*100				EPA 6010		
nic (As)	ND	30.0	mg/kg	EPA 6010		
ium (Cd)	ND	5.00	mg/kg	EPA 6010		
nium (Cr)	ND	5.00	mg/kg	EPA 6010		
(Pb)	ND	5.00	mg/kg	EPA 6010		
ydrocarbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
minated Biphenyls		*1		EPA 8080	09/22/94	CJS
lor-1016	ND	33	ug/kg	EPA 8080		
lor-1221	ND	33	ug/kg	EPA 8080		
lor-1232	ND	33	ug/kg	EPA 8080		
or-1242	ND	33	ug/kg	EPA 8080		
or-1248	ND	33	ug/kg	EPA 8080		
or-1254	ND	33	ug/kg	EPA 8080		
or-1260	89	33	ug/kg	EPA 8080		
chloro-m-xylene (SURROGATE)	63	0	% Recovery	QC LIMITS 40-130		

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## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

ER# 942323 CUSTOMER# 0100011 Co./?Advanced Resources ATTN: Del Parker

D.....  
PLED.....: 09/20/94  
PLED.....: 14:46  
CRIPTION...: HA-2-9'

LABORATORY I.D....: 942323-0006  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brsslv-soil

DESCRIPTION	FINAL RESULT	LEADS/CONTAMINANT	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
test for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EWL
on Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/22/94	DC
Organics by GC/MS		*1		EPA 8240	09/22/94	CIS
ane	ND	10	ug/kg	EPA 8240		
ene	ND	5	ug/kg	EPA 8240		
odichloromethane	ND	5	ug/kg	EPA 8240		
xform	ND	5	ug/kg	EPA 8240		
methane	ND	10	ug/kg	EPA 8240		
tanone	ND	10	ug/kg	EPA 8240		
on disulfide	ND	5	ug/kg	EPA 8240		
on tetrachloride	ND	5	ug/kg	EPA 8240		
obenzene	ND	5	ug/kg	EPA 8240		
odibromomethane	ND	5	ug/kg	EPA 8240		
oethane	ND	10	ug/kg	EPA 8240		
loroethylvinyl ether	ND	10	ug/kg	EPA 8240		
xform	ND	5	ug/kg	EPA 8240		
omethane	ND	10	ug/kg	EPA 8240		
ichloroethane	ND	5	ug/kg	EPA 8240		
ichloroethane	ND	5	ug/kg	EPA 8240		
ichloroethene	ND	5	ug/kg	EPA 8240		
L 1,2-Dichloroethenes	ND	5	ug/kg	EPA 8240		
ichloropropane	ND	5	ug/kg	EPA 8240		
I,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
s-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
benzene	ND	5	ug/kg	EPA 8240		
anone	ND	10	ug/kg	EPA 8240		
/lana Chloride	ND	5	ug/kg	EPA 8240		
hyl-2-pentanone	ND	10	ug/kg	EPA 8240		
ne	ND	5	ug/kg	EPA 8240		
L,2-Tetrachloroethane	ND	5	ug/kg	EPA 8240		
chloroethene	ND	5	ug/kg	EPA 8240		
L-Trichloroethane	ND	5	ug/kg	EPA 8240		
I-Trichloroethane	ND	5	ug/kg	EPA 8240		
loroethene	ND	5	ug/kg	EPA 8240		
ne	ND	5	ug/kg	EPA 8240		
acetate	ND	10	ug/kg	EPA 8240		
chloride	ND	10	ug/kg	EPA 8240		
Xylenes	ND	5	ug/kg	EPA 8240		
ichloroethane (SURROGATE)	90	0	% Recovery	70-121% QC LIMITS		
luene (SURROGATE)	101	0	% Recovery	88-110% QC LIMITS		
mofluorobenzene (SURROGATE)	97	0	% Recovery	74-121% QC LIMITS		

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## Core Laboratories

LABORATORY TESTS RESULTS  
09/23/94

NUMBER: 942323 CUSTOMER: DUCOR INC./Advanced Resources TEST: Soil Permeability

T I.D. ....  
SAMPLED....: 09/20/94  
SAMPLED....: 14:46  
DESCRIPTION...: HA-2-9\*LABORATORY I.D....: 942323-0006  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 breasy-soil

DESCRIPTION	FINAL RESULT	THICKNESS/STRENGTH	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
Petroleum Hydrocarbons		*1		EPA 8015 (modified)	09/22/94	RVJ
diesel	ND	10	mg/kg	EPA 8015 (modified)		
s		*100		EPA 6010	09/22/94	VB
arsenic (As)	ND	30.0	mg/kg	EPA 6010		
cadmium (Cd)	ND	5.00	mg/kg	EPA 6010		
chromium (Cr)	8.9	5.00	mg/kg	EPA 6010		
lead (Pb)	ND	5.00	mg/kg	EPA 6010		
Hydrocarbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
chlorinated Biphenyls		*1		EPA 8080	09/22/94	CIS
octor-1016	ND	33	ug/kg	EPA 8080		
octor-1221	ND	33	ug/kg	EPA 8080		
octor-1232	ND	33	ug/kg	EPA 8080		
octor-1242	ND	33	ug/kg	EPA 8080		
octor-1248	ND	33	ug/kg	EPA 8080		
octor-1254	ND	33	ug/kg	EPA 8080		
octor-1260	ND	33	ug/kg	EPA 8080		
trichloro-m-xylene (SURROGATE)	80	0	% Recovery	QC LIMITS 40-130		

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### LABORATORY TESTS RESULTS 09/23/94

NUMBER: 24222 CUSTOMER: DTSC-DL Co./Advanced Resources ATEN: Det. Parker

ENT I.D.:  
SAMPLED: 09/20/94  
SAMPLED: 15:19  
DESCRIPTION: HA-3-3

LABORATORY I.D.: 942323-0007  
DATE RECEIVED: 09/21/94  
TIME RECEIVED: 12:35  
REMARKS: 1 brssly-soil

DESCRIPTION	FINAL RESULT	DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
Digestion for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EAN
cation Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/22/94	DC
total Organics by GC/MS		*1		EPA 8240	09/22/94	CIS
Acetone	ND	10	ug/kg	EPA 8240		
Benzene	ND	5	ug/kg	EPA 8240		
Bromodichloromethane	ND	5	ug/kg	EPA 8240		
Bromoform	ND	5	ug/kg	EPA 8240		
Bromomethane	ND	10	ug/kg	EPA 8240		
2-Butanone	ND	10	ug/kg	EPA 8240		
Carbon disulfide	ND	5	ug/kg	EPA 8240		
Carbon tetrachloride	ND	5	ug/kg	EPA 8240		
Chlorobenzene	ND	5	ug/kg	EPA 8240		
Chlorodibromomethane	ND	5	ug/kg	EPA 8240		
Chloroethane	ND	10	ug/kg	EPA 8240		
2-Chloroethylvinyl ether	ND	10	ug/kg	EPA 8240		
Chloroform	ND	5	ug/kg	EPA 8240		
Chloromethane	ND	10	ug/kg	EPA 8240		
1,1-Dichloroethane	ND	5	ug/kg	EPA 8240		
1,2-Dichloroethane	ND	5	ug/kg	EPA 8240		
1,1-Dichloroethene	ND	5	ug/kg	EPA 8240		
total 1,2-Dichloroethenes	ND	5	ug/kg	EPA 8240		
1,2-Dichloropropane	ND	5	ug/kg	EPA 8240		
trans-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
ethylbenzene	ND	5	ug/kg	EPA 8240		
1-Hexanone	ND	10	ug/kg	EPA 8240		
ethylene Chloride	ND	5	ug/kg	EPA 8240		
-Methyl-2-pentanone	ND	10	ug/kg	EPA 8240		
tyrene	ND	5	ug/kg	EPA 8240		
,1,2,2-Tetrachloroethane	ND	5	ug/kg	EPA 8240		
tetrachloroethene	ND	5	ug/kg	EPA 8240		
,1,1-Trichloroethane	ND	5	ug/kg	EPA 8240		
,1,2-Trichloroethane	ND	5	ug/kg	EPA 8240		
richloroethene	ND	5	ug/kg	EPA 8240		
oluene	ND	5	ug/kg	EPA 8240		
inyl acetate	ND	10	ug/kg	EPA 8240		
inyl chloride	ND	10	ug/kg	EPA 8240		
total Xylenes	ND	5	ug/kg	EPA 8240		
4-Dichloroethane (SURROGATE)	90	0	% Recovery	70-121% QC LIMITS		
3-Toluene (SURROGATE)	104	0	% Recovery	88-110% QC LIMITS		
-Bromofluorobenzene (SURROGATE)	96	0	% Recovery	74-121% QC LIMITS		

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9095907810:#14

CORE ANAHEIM

9-26-94 : 5:27PM :

SENT BY:



Core Laboratories

LABORATORY TESTS RESULTS  
09/23/94

JB-NUMBER: 942323-0007 CUSTOMER: DRCO-DRG-602//Advanced Resources ATTN: Ref. Pat. Rep.

JENT I.D.:  
LTC SAMPLED: 09/20/94  
ME SAMPLED: 15:19  
IRK DESCRIPTION: HA-3-31LABORATORY I.D.: 942323-0007  
DATE RECEIVED: 09/21/94  
TIME RECEIVED: 12:35  
REMARKS: 1 brssly-soil

ST-DESCRIPTION	FINAL RESULT	UNITS/CONCUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
Total Petroleum Hydrocarbons		*1		EPA 8015 (modified)	09/22/94	RVJ
Diesel	100	10	mg/kg	EPA 8015 (modified)		
Tals		*100		EPA 6010	09/22/94	VB
Arsenic (As)	ND	30.0	mg/kg	EPA 6010		
Cadmium (Cd)	ND	5.00	mg/kg	EPA 6010		
Chromium (Cr)	ND	5.00	mg/kg	EPA 6010		
Lead (Pb)	ND	5.00	mg/kg	EPA 6010		
Total Hydrocarbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
Polychlorinated Biphenyls		*1		EPA 8080	09/22/94	CIS
Aroclor-1016	ND	33	ug/kg	EPA 8080		
Aroclor-1221	ND	33	ug/kg	EPA 8080		
Aroclor-1232	ND	33	ug/kg	EPA 8080		
Aroclor-1242	ND	33	ug/kg	EPA 8080		
Aroclor-1248	ND	33	ug/kg	EPA 8080		
Aroclor-1254	ND	33	ug/kg	EPA 8080		
Aroclor-1260	44	33	ug/kg	EPA 8080		
Tetrachloro-m-xylene (SURROGATE)	69	0	% Recovery	QC LIMITS 40-130		

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S0550U7RATU#15

CORE ANAHEIM

6-97-94 : 5:27PM :

SEND BY:



**Core Laboratories**

**LABORATORY TESTS RESULTS**  
09/23/94

NUMBER: 942323 CUSTOMER: DLM-011-68 //Advanced Resources// ATTN: DLR-PKY DATE: 09/23/94

IT I.D.....  
SAMPLED....: 09/20/94  
SAMPLED....: 15:30  
DESCRIPTION...: HA-3-61

LABORATORY I.D....: 942323-0008  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brsslv-soil

DESCRIPTION	FINAL RESULT	LIMITS/REDUCTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
I Petroleum Hydrocarbons		*1		EPA 8015 (modified)	09/22/94	RVJ
Diesel	ND	10	mg/kg	EPA 8015 (modified)		
ls		*100		EPA 6010	09/22/94	VB-
Arsenic (As)	ND	30.0	mg/kg	EPA 6010		
Cadmium (Cd)	ND	5.00	mg/kg	EPA 6010		
Chromium (Cr)	ND	5.00	mg/kg	EPA 6010		
Lead (Pb)	ND	5.00	mg/kg	EPA 6010		
I Hydrocarbons Extraction	COMPLETED	-----	N/A	Cal. DNS Method	09/22/94	RW
chlorinated Biphenyls		*1		EPA 8080	09/22/94	CIS
Aroclor-1016	ND	33	ug/kg	EPA 8080		
Aroclor-1221	ND	33	ug/kg	EPA 8080		
Aroclor-1232	ND	33	ug/kg	EPA 8080		
Aroclor-1242	ND	33	ug/kg	EPA 8080		
Aroclor-1248	ND	33	ug/kg	EPA 8080		
Aroclor-1254	ND	33	ug/kg	EPA 8080		
Aroclor-1260	ND	33	ug/kg	EPA 8080		
Tetrachloro-m-xylene (SURROGATE)	70	0	% Recovery	QC LIMITS 40-130		

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LABORATORY TESTS RESULTS  
09/23/94

B-NUMBERS: 942323		CUSTOMER: DUEO-OIL CO./Advanced Resources		XFILE: DUEO	
IDENT I.D.....				LABORATORY I.D....: 942323-0009	
DATE SAMPLED.....	09/20/94			DATE RECEIVED....: 09/21/94	
TIME SAMPLED.....	15:51			TIME RECEIVED....: 12:35	
WK DESCRIPTION....	HA-3-91			REMARKS.....: 1 brsslv-soil	
TEST DESCRIPTION	FINAL RESULT	LIMIT/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE
id Digestion for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94
ication Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/22/94
olatile Organics by GC/MS		*1		EPA 8240	09/22/94
Acetone	ND	10	ug/kg	EPA 8240	
Benzene	ND	5	ug/kg	EPA 8240	
Bromodichloromethane	ND	5	ug/kg	EPA 8240	
Bromoform	ND	5	ug/kg	EPA 8240	
Bromomethane	ND	10	ug/kg	EPA 8240	
2-Butanone	ND	10	ug/kg	EPA 8240	
Carbon disulfide	ND	5	ug/kg	EPA 8240	
Carbon tetrachloride	ND	5	ug/kg	EPA 8240	
Chlorobenzene	ND	5	ug/kg	EPA 8240	
Chlorodibromomethane	ND	5	ug/kg	EPA 8240	
Chloroethane	ND	10	ug/kg	EPA 8240	
2-Chloroethylvinyl ether	ND	10	ug/kg	EPA 8240	
Chloroform	ND	5	ug/kg	EPA 8240	
Chloromethane	ND	10	ug/kg	EPA 8240	
,1-Dichloroethane	ND	5	ug/kg	EPA 8240	
,2-Dichloroethane	ND	5	ug/kg	EPA 8240	
,1-Dichloroethene	ND	5	ug/kg	EPA 8240	
total 1,2-Dichloroethenes	ND	5	ug/kg	EPA 8240	
,2-Dichloropropane	ND	5	ug/kg	EPA 8240	
is-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240	
trans-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240	
Methylbenzene	ND	5	ug/kg	EPA 8240	
Hexanone	ND	10	ug/kg	EPA 8240	
ethylene Chloride	ND	5	ug/kg	EPA 8240	
Methyl-2-pentanone	ND	10	ug/kg	EPA 8240	
xyrene	ND	5	ug/kg	EPA 8240	
1,2,2-Tetrachloroethane	ND	5	ug/kg	EPA 8240	
trachloroethene	ND	5	ug/kg	EPA 8240	
1,1-Trichloroethane	ND	5	ug/kg	EPA 8240	
1,2-Trichloroethane	ND	5	ug/kg	EPA 8240	
chloroethene	ND	5	ug/kg	EPA 8240	
ene	ND	5	ug/kg	EPA 8240	
yl acetate	ND	10	ug/kg	EPA 8240	
yl chloride	ND	10	ug/kg	EPA 8240	
al Xylenes	ND	5	ug/kg	EPA 8240	
Dichloroethane (SURROGATE)	90	0	% Recovery	70-121% QC LIMITS	
Toluene (SURROGATE)	98	0	% Recovery	88-110% QC LIMITS	
amofluorobenzene (SURROGATE)	99	0	% Recovery	74-121% QC LIMITS	

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LABORATORY TESTS RESULTS  
09/23/94

ITEM NUMBER	CUSTOMER	ATTN:				
942323	BICO OIL Co./Advanced Resources	Del Parker				
ITEM I.D.....		LABORATORY I.D....: 942323-0009				
E SAMPLED.....	09/20/94	DATE RECEIVED....: 09/21/94				
E SAMPLED.....	15:51	TIME RECEIVED....: 12:35				
K DESCRIPTION...: HA-3-91		REMARKS.....: 1 brastv-soil				
DESCRIPTION	FINAL RESULT	LIMITS/ DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
oil Petroleum Hydrocarbons		*1		EPA 8015 (modified)	09/22/94	KVJ
Diesel	ND	10	mg/kg	EPA 8015 (modified)		
ils		*100		EPA 6010	09/22/94	VBL
Arsenic (As)	ND	30.0	mg/kg	EPA 6010		
Cadmium (Cd)	ND	5.00	mg/kg	EPA 6010		
Chromium (Cr)	ND	5.00	mg/kg	EPA 6010		
Lead (Pb)	ND	5.00	mg/kg	EPA 6010		
I Hydrocarbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
chlorinated Biphenyls		*1		EPA 8080	09/22/94	CIS
rochlor-1016	ND	33	ug/kg	EPA 8080		
rochlor-1221	ND	33	ug/kg	EPA 8080		
rochlor-1232	ND	33	ug/kg	EPA 8080		
rochlor-1242	ND	33	ug/kg	EPA 8080		
rochlor-1248	ND	33	ug/kg	EPA 8080		
rochlor-1254	ND	33	ug/kg	EPA 8080		
rochlor-1260	ND	33	ug/kg	EPA 8080		
etrachloro-m-xylene (SURROGATE)	73	0	% Recovery	QC LIMITS 40-130		

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LABORATORY TESTS RESULTS  
09/23/94

ER- 942323 CUSTOMER: DICO-011-60 / Advanced Resources

ATTN: Del Parker

PLD.....: 09/20/94  
PLED.....: 16:13  
CRIPTION...: HA-4-3<sup>a</sup>

LABORATORY I.D...: 942323-0010  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brssly-soil

DESCRIPTION	FINAL RESULT	LIMITS/DETECTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN.
Test for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EW
Test Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/22/94	DC
Organics by GC/MS		*5		EPA 8240	09/22/94	CIS
ne	ND	50	ug/kg	EPA 8240		
ne	98	25	ug/kg	EPA 8240		
Dichloromethane	ND	25	ug/kg	EPA 8240		
Form	ND	25	ug/kg	EPA 8240		
nethane	ND	50	ug/kg	EPA 8240		
anone	51	50	ug/kg	EPA 8240		
1 disulfide	ND	25	ug/kg	EPA 8240		
1 tetrachloride	ND	25	ug/kg	EPA 8240		
benzene	ND	25	ug/kg	EPA 8240		
idibromomethane	ND	25	ug/kg	EPA 8240		
ethane	ND	50	ug/kg	EPA 8240		
roethylvinyl ether	ND	50	ug/kg	EPA 8240		
form	ND	25	ug/kg	EPA 8240		
methane	ND	50	ug/kg	EPA 8240		
chloroethane	ND	25	ug/kg	EPA 8240		
chloroethane	ND	25	ug/kg	EPA 8240		
chloroethane	ND	25	ug/kg	EPA 8240		
1,2-Dichloroethenes	ND	25	ug/kg	EPA 8240		
chloropropene	ND	25	ug/kg	EPA 8240		
3-Dichloropropene	ND	25	ug/kg	EPA 8240		
1,3-Dichloropropene	ND	25	ug/kg	EPA 8240		
enzen	570	25	ug/kg	EPA 8240		
none	ND	50	ug/kg	EPA 8240		
ne Chloride	ND	25	ug/kg	EPA 8240		
/l-2-pantanone	ND	50	ug/kg	EPA 8240		
	ND	25	ug/kg	EPA 8240		
l-Tetrachloroethane	ND	25	ug/kg	EPA 8240		
loroethene	110	25	ug/kg	EPA 8240		
richloroethano	52	25	ug/kg	EPA 8240		
richloroethane	ND	25	ug/kg	EPA 8240		
roethene	ND	25	ug/kg	EPA 8240		
	1400	25	ug/kg	EPA 8240		
cetate	ND	50	ug/kg	EPA 8240		
hloride	ND	50	ug/kg	EPA 8240		
ylenes	2900	25	ug/kg	EPA 8240		
Loroethane (SURROGATE)	95	0	% Recovery	70-121% QC LIMITS		
ene (SURROGATE)	109	0	% Recovery	88-110% QC LIMITS		
fluorobenzene (SURROGATE)	148(a)	0	% Recovery	74-121% QC LIMITS		

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Core Laboratories

LABORATORY TESTS RESULTS  
09/23/94

CUSTOMER: MICRO OIL CO./ADVANCED RESOURCE

AT/NP-Det. Barley

ED.....: 09/20/94  
ED.....: 16:13  
PTION...: HA-4-3

LABORATORY I.D...: 942323-0010  
DATE RECEIVED...: 09/21/94  
TIME RECEIVED...: 12:35  
REMARKS.....: 1 brsely-soil

PTION	FINAL RESULT	LIMITS/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
l cum Hydrocarbons		*5		EPA 8015 (modified)	09/22/94	RVJ
	1100	50	mg/kg	EPA 8015 (modified)		
		*100		EPA 6010	09/22/94	VB
(A8)	ND	30.0	mg/kg	EPA 6010		
(Cd)	ND	5.00	mg/kg	EPA 6010		
l (Cr)	ND	5.00	mg/kg	EPA 6010		
)	ND	5.00	mg/kg	EPA 6010		
arbons Extraction	COMPLETED	-----	N/A	EPA 6010		
ted Biphenyls		*20		Cal. DHS Method	09/22/94	RW
016				EPA 8080	09/22/94	CIS
221	ND	660	ug/kg	EPA 8080		
232	ND	660	ug/kg	EPA 8080		
242	ND	660	ug/kg	EPA 8080		
248	ND	660	ug/kg	EPA 8080		
254	ND	660	ug/kg	EPA 8080		
260	ND	660	ug/kg	EPA 8080		
'O- <sup>m</sup> -Xylene (SURROGATE)	93	660	ug/kg	EPA 8080		
		0	% Recovery	QC LIMITS 40-130		

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**Core Laboratories**

**LABORATORY TESTS RESULTS**  
09/23/94

REF: 942323

CUSTOMER: DDO-DL Co./Advanced Resources

ATTN: Del Parker

I.D.....  
AMPLED....: 09/20/94  
AMPLED....: 16:34  
SCRIPTION...: HA-4-6'

LABORATORY I.D...: 942323-0011  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brssly-soil

DESCRIPTION	FINAL RESULT	LIMITS/DETECTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN.
Extraction for ICP	COMPLETED	-----	N/A	EPA 3050	09/21/94	EW
Extraction for PCBs	COMPLETED	-----	N/A	EPA 3550	09/22/94	DC
Organics by GC/MS		*1		EPA 8240	09/22/94	CIS
ne	33	10	ug/kg	EPA 8240		
ne	ND	5	ug/kg	EPA 8240		
Dichloromethane	ND	5	ug/kg	EPA 8240		
form	ND	5	ug/kg	EPA 8240		
methane	ND	10	ug/kg	EPA 8240		
none	ND	10	ug/kg	EPA 8240		
disulfide	ND	5	ug/kg	EPA 8240		
tetrachloride	ND	5	ug/kg	EPA 8240		
benzene	ND	5	ug/kg	EPA 8240		
dibromomethane	ND	5	ug/kg	EPA 8240		
thane	ND	10	ug/kg	EPA 8240		
propylvinyl ether	ND	10	ug/kg	EPA 8240		
form	ND	5	ug/kg	EPA 8240		
ethane	ND	10	ug/kg	EPA 8240		
chloroethane	ND	5	ug/kg	EPA 8240		
chloroethane	ND	5	ug/kg	EPA 8240		
chloroethene	ND	5	ug/kg	EPA 8240		
1,2-Dichloroethenes	ND	5	ug/kg	EPA 8240		
chloropropane	ND	5	ug/kg	EPA 8240		
Dichloropropene	ND	5	ug/kg	EPA 8240		
3-Dichloropropene	ND	5	ug/kg	EPA 8240		
zene	33	5	ug/kg	EPA 8240		
ne	ND	10	ug/kg	EPA 8240		
chloride	ND	5	ug/kg	EPA 8240		
-2-pantanone	ND	10	ug/kg	EPA 8240		
trachloroethane	ND	5	ug/kg	EPA 8240		
roethene	8	5	ug/kg	EPA 8240		
chloroethane	ND	5	ug/kg	EPA 8240		
chloroethane	ND	5	ug/kg	EPA 8240		
ethene	ND	5	ug/kg	EPA 8240		
ate	69	5	ug/kg	EPA 8240		
roide	ND	10	ug/kg	EPA 8240		
nes	ND	10	ug/kg	EPA 8240		
roethane (SURROGATE)	150	5	% Recovery	70-121% QC LIMITS		
ro (SURROGATE)	97	0	% Recovery	88-110% QC LIMITS		
robenzene (SURROGATE)	104	0	% Recovery	74-121% QC LIMITS		
	115	0	% Recovery			

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LABORATORY TESTS RESULTS  
09/23/94

942323 CUSTOMER: DITCO OIL Co./Advanced Resources

ATTN: Del Parker

D.....  
LED.....: 09/20/94  
LED.....: 16:34  
RIPTION...: HA-4-6LABORATORY I.D....: 942323-0011  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brassy-soil

SECTION	FINAL RESULT	UNITS/ADDITION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
Petroleum Hydrocarbons		*1		EPA 8015 (modified)	09/22/94	RVJ
1	11	10	mg/kg	EPA 8015 (modified)		
		*100		EPA 6010	09/22/94	VB
c (As)	ND	30.0	mg/kg	EPA 6010		
n (Cd)	ND	5.00	mg/kg	EPA 6010		
m (Cr)	ND	5.00	mg/kg	EPA 6010		
b)	ND	5.00	mg/kg	EPA 6010		
carbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
ated Biphenyls		*1		EPA 8080	09/22/94	CJS
1016	ND	33	ug/kg	EPA 8080		
1221	ND	33	ug/kg	EPA 8080		
1232	ND	33	ug/kg	EPA 8080		
1242	ND	33	ug/kg	EPA 8080		
1248	ND	33	ug/kg	EPA 8080		
1254	ND	33	ug/kg	EPA 8080		
1260	ND	33	ug/kg	EPA 8080		
iso-m-xylene (SURROGATE)	68	0	% Recovery	GC LIMITS 40-130		

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LABORATORY TESTS RESULTS  
09/23/94

BR: 942323 CUSTOMER: DFCO INC./Advanced Resources

HHT: Del Ritter

D.....  
PLED....: 09/20/94  
PLED....: 16:52  
CRIPTION...: HA-4-9'LABORATORY I.D.: 942323-0012  
DATE RECEIVED...: 09/21/94  
TIME RECEIVED...: 12:35  
REMARKS.....: 1 brassy-soil

DESCRIPTION	FINAL RESULT	DEPTH/DEPTHL	UNITS OF MEASURE	TEST METHOD	DATE	TECHN.
test for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EAN
on Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/22/94	DC
Organics by GC/MS		*1		EPA 8240	09/22/94	CIS
ne	ND	10	ug/kg	EPA 8240		
ne	ND	5	ug/kg	EPA 8240		
dichloromethane	ND	5	ug/kg	EPA 8240		
Form	ND	5	ug/kg	EPA 8240		
methane	ND	10	ug/kg	EPA 8240		
none	ND	10	ug/kg	EPA 8240		
disulfide	ND	5	ug/kg	EPA 8240		
tetrachloride	ND	5	ug/kg	EPA 8240		
benzene	ND	5	ug/kg	EPA 8240		
dibromomethane	ND	5	ug/kg	EPA 8240		
ethane	ND	10	ug/kg	EPA 8240		
oethylvinyl ether	ND	10	ug/kg	EPA 8240		
form	ND	5	ug/kg	EPA 8240		
ethane	ND	10	ug/kg	EPA 8240		
chloroethane	ND	5	ug/kg	EPA 8240		
chloroethane	ND	5	ug/kg	EPA 8240		
chloroethylene	ND	5	ug/kg	EPA 8240		
1,2-Dichloroethene	ND	5	ug/kg	EPA 8240		
1,1-dichloropropane	ND	5	ug/kg	EPA 8240		
Dichloropropene	ND	5	ug/kg	EPA 8240		
3-Dichloropropene	ND	5	ug/kg	EPA 8240		
zene	ND	5	ug/kg	EPA 8240		
ne	ND	10	ug/kg	EPA 8240		
-e Chloride	ND	5	ug/kg	EPA 8240		
-Z-pentanone	ND	10	ug/kg	EPA 8240		
Tetrachloroethane	ND	5	ug/kg	EPA 8240		
neothene	ND	5	ug/kg	EPA 8240		
chloroethane	ND	5	ug/kg	EPA 8240		
chloroethene	ND	5	ug/kg	EPA 8240		
ethene	ND	5	ug/kg	EPA 8240		
cate	ND	10	ug/kg	EPA 8240		
iride	ND	10	ug/kg	EPA 8240		
mes	ND	5	ug/kg	EPA 8240		
oethane (SURROGATE)	90	0	% Recovery	70-121% QC LIMITS		
(SURROGATE)	100	0	% Recovery	88-110% QC LIMITS		
robenzene (SURROGATE)	100	0	% Recovery	74-121% QC LIMITS		

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LABORATORY TESTS RESULTS  
09/23/94

A NUMBER: 942323

CUSTOMER: DICO-PIL Co./Advanced Resources

ATTN: DE Parker

IDENT I.D.....: DATE SAMPLED.....: 09/20/94  
TIME SAMPLED.....: 16:52  
WORK DESCRIPTION....: HA-4-9\*LABORATORY I.D....: 942323-0012  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brassy-soil

TEST DESCRIPTION	FINAL RESULT	INSTR/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECH
Total Petroleum Hydrocarbons		*1		EPA 8015 (modified)	09/22/94	RVJ
Diesel	ND	10	mg/kg	EPA 8015 (modified)		
oils		*100		EPA 6010	09/22/94	VB
Arsenic (As)	ND	30.0	mg/kg	EPA 6010		
Cadmium (Cd)	ND	5.00	mg/kg	EPA 6010		
Chromium (Cr)	ND	5.00	mg/kg	EPA 6010		
Lead (Pb)	ND	5.00	mg/kg	EPA 6010		
T Hydrocarbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
chlorinated Biphenyls		*1		EPA 8080	09/22/94	CIS
roctor-1016	ND	33	ug/kg	EPA 8080		
roctor-1221	ND	33	ug/kg	EPA 8080		
roctor-1232	ND	33	ug/kg	EPA 8080		
roctor-1242	ND	33	ug/kg	EPA 8080		
roctor-1248	ND	33	ug/kg	EPA 8080		
roctor-1254	ND	33	ug/kg	EPA 8080		
roctor-1260	ND	33	ug/kg	EPA 8080		
trachloro-m-xylene (SURROGATE)	69	0	% Recovery	QC LIMITS 40-130		

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LABORATORY TESTS RESULTS  
09/23/94

09/23/94

NUMBER - 94232

CUSTOMER: DICO OIL NO./Advanced Resources

ATTN: Del Parker

ENT I.D.....  
TE SAMPLED.....: 09/20/94  
ME SAMPLED.....: 18:04  
RK DESCRIPTION...: HA-5-3

LABORATORY I.D.: 942523-0013  
DATE RECEIVED: 09/21/94  
TIME RECEIVED: 12:35  
REMARKS: bssly-xoi

TEST DESCRIPTION	FINAL RESULT	LIMITS/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHNIQUE
4 Digestion for ICP	COMPLETED	-----	N/A	EPA 3050	09/21/94	EW
ication Extraction for PCBs	COMPLETED	-----	N/A	EPA 3550	09/22/94	DC
Volatile Organics by GC/MS		*5		EPA 8240	09/22/94	CIS
Acetone	220	50	ug/kg	EPA 8240		
Benzene	46	25	ug/kg	EPA 8240		
Bromodichloromethane	ND	25	ug/kg	EPA 8240		
Bromoform	ND	25	ug/kg	EPA 8240		
Bromomethane	ND	50	ug/kg	EPA 8240		
2-Butanone	ND	50	ug/kg	EPA 8240		
Carbon disulfide	ND	25	ug/kg	EPA 8240		
Carbon tetrachloride	ND	25	ug/kg	EPA 8240		
Chlorobenzene	ND	25	ug/kg	EPA 8240		
Chlorodibromomethane	ND	25	ug/kg	EPA 8240		
chloroethane	ND	50	ug/kg	EPA 8240		
-Chloroethylvinyl ether	ND	50	ug/kg	EPA 8240		
chloroform	ND	25	ug/kg	EPA 8240		
chloromethane	ND	50	ug/kg	EPA 8240		
1-Dichloroethane	ND	25	ug/kg	EPA 8240		
2-Dichloroethane	ND	25	ug/kg	EPA 8240		
1-Dichloroethene	ND	25	ug/kg	EPA 8240		
1,1,2-Dichloroethenes	ND	25	ug/kg	EPA 8240		
2-Dichloropropane	ND	25	ug/kg	EPA 8240		
s-1,3-Dichloropropene	ND	25	ug/kg	EPA 8240		
trans-1,3-Dichloropropene	ND	25	ug/kg	EPA 8240		
tolylbenzene	ND	25	ug/kg	EPA 8240		
exanone	ND	50	ug/kg	EPA 8240		
ethylene Chloride	ND	25	ug/kg	EPA 8240		
ethyl-2-pentanone	ND	50	ug/kg	EPA 8240		
rene	ND	25	ug/kg	EPA 8240		
,2,2-Tetrachloroethane	ND	25	ug/kg	EPA 8240		
chloroethene	ND	25	ug/kg	EPA 8240		
1-Trichloroethane	ND	25	ug/kg	EPA 8240		
2-Trichloroethane	ND	25	ug/kg	EPA 8240		
chloroethene	ND	25	ug/kg	EPA 8240		
ene	ND	25	ug/kg	EPA 8240		
l acetate	ND	50	ug/kg	EPA 8240		
chloride	ND	50	ug/kg	EPA 8240		
Xylenes	380	25	ug/kg	EPA 8240		
chloroethane (SURROGATE)	94	0	% Recovery	70-121% QC LIMITS		
luene (SURROGATE)	113	0	% Recovery	88-110% QC LIMITS		
perfluorobenzene (SURROGATE)	495(a)	0	% Recovery	74-121% QC LIMITS		

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LABORATORY TESTS RESULTS  
09/23/94

BR#	CUSTOMER	ATTN:				
942323	OFCO OIL Co./Advanced Resources	Det. Parker				
D.....		LABORATORY I.D.: 942323-0013				
PLED.....	09/20/94	DATE RECEIVED....: 09/21/94				
PLED.....	18:04	TIME RECEIVED....: 12:35				
SCRIPTION....	HA-5-3'	REMARKS.....: 1 brsly-soil				
DESCRIPTION	FINAL RESULT	LIMIT/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECH
oleum Hydrocarbons		*1		EPA 8015 (modified)	09/22/94	RVJ
l	10000	50	mg/kg	EPA 8015 (modified)		
		*100		EPA 6010	09/22/94	VB
ic (As)	ND	30.0	mg/kg	EPA 6010		
im (Cd)	ND	5.00	mg/kg	EPA 6010		
um (Cr)	ND	5.00	mg/kg	EPA 6010		
Pb)	ND	5.00	mg/kg	EPA 6010		
ocarbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
inated Biphenyls		*20		EPA 8080	09/22/94	CIS
-1016	ND	660	ug/kg	EPA 8080		
-1221	ND	660	ug/kg	EPA 8080		
-1232	ND	660	ug/kg	EPA 8080		
-1242	ND	660	ug/kg	EPA 8080		
-1248	ND	660	ug/kg	EPA 8080		
-1254	ND	660	ug/kg	EPA 8080		
-1260	ND	660	ug/kg	EPA 8080		
ro-m-Xylene (SURROGATE)	1500	660	ug/kg	EPA 8080		
	88	0	% Recovery	QC LIMITS 40-130		

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LABORATORY TESTS RESULTS  
09/23/94

B. NUMBER: 942323

CUSTOMER: PICO-ON-Lab./Advanced Resource

ATTN: Del Norte

ITEM I.D.:  
TE SAMPLED: 09/20/94  
TE SAMPLED: 18:19  
K DESCRIPTION: II-A-5-6

LABORATORY I.D.: 942323-0014  
DATE RECEIVED: 09/21/94  
TIME RECEIVED: 12:35  
REMARKS: 1 brsly-soil

DESCRIPTION	FINAL RESULT	LIMITS/DETECTION UNITS OF MEASURE	TEST METHOD	DATE	TECHN.
Digestion for ICP	COMPLETED	-----	N/A	EPA 3050	09/21/94
Extraction for PCBs	COMPLETED	-----	N/A	EPA 3550	09/22/94
Volatile Organics by GC/MS		*5		EPA 8240	09/22/94
Cetene	260	50	ug/kg	EPA 8240	
benzene	ND	25	ug/kg	EPA 8240	
chlorodichloromethane	ND	25	ug/kg	EPA 8240	
chloroform	ND	25	ug/kg	EPA 8240	
chloromethane	ND	25	ug/kg	EPA 8240	
Butanone	ND	50	ug/kg	EPA 8260	
carbon disulfide	ND	50	ug/kg	EPA 8240	
carbon tetrachloride	ND	25	ug/kg	EPA 8240	
chlorobenzene	ND	25	ug/kg	EPA 8240	
chlorodibromomethane	ND	25	ug/kg	EPA 8240	
chloroethane	ND	25	ug/kg	EPA 8240	
chloroethylvinyl ether	ND	50	ug/kg	EPA 8240	
cycloform	ND	25	ug/kg	EPA 8240	
methane	ND	25	ug/kg	EPA 8240	
-Dichloroethane	ND	50	ug/kg	EPA 8240	
-Dichloroethane	ND	25	ug/kg	EPA 8240	
-Dichloroethene	ND	25	ug/kg	EPA 8240	
1,1,2-Dichloroethenes	ND	25	ug/kg	EPA 8240	
Dichloropropane	ND	25	ug/kg	EPA 8240	
1,3-Dichloropropene	ND	25	ug/kg	EPA 8240	
1,1,1,3-dichloropropene	ND	25	ug/kg	EPA 8240	
benzene	ND	25	ug/kg	EPA 8240	
carbon	ND	25	ug/kg	EPA 8240	
chloroform	ND	50	ug/kg	EPA 8240	
ethylene chloride	ND	25	ug/kg	EPA 8240	
ethyl-2-pentanone	ND	50	ug/kg	EPA 8240	
he	ND	25	ug/kg	EPA 8240	
1,2-Tetrachloroethane	ND	50	ug/kg	EPA 8240	
chloroethene	ND	25	ug/kg	EPA 8240	
Trichloroethane	ND	25	ug/kg	EPA 8240	
Trichloroethane	ND	25	ug/kg	EPA 8240	
acothene	ND	25	ug/kg	EPA 8240	
c	ND	25	ug/kg	EPA 8240	
acetate	56	25	ug/kg	EPA 8240	
chloride	ND	25	ug/kg	EPA 8240	
tylenes	ND	50	ug/kg	EPA 8240	
chloroethane (SURROGATE)	350	25	ug/kg	EPA 8240	
lene (SURROGATE)	89	0	ug/kg	EPA 8240	
fluorobenzene (SURROGATE)	106	0	% Recovery	70-121% QC LIMITS	
	202(a)	0	% Recovery	88-110% QC LIMITS	
			% Recovery	74-121% QC LIMITS	

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LABORATORY TESTS RESULTS  
09/26/94

REF #	CUSTOMER	ATTN:			
942323	DIGO-ON-L Co Advanced Resources	Don Parker			
I.D. ....		LABORATORY I.D.: 942323-0014			
MPLED.....	09/20/94	DATE RECEIVED....: 09/21/94			
MPLED.....	18:19	TIME RECEIVED....: 12:35			
SCRIPTION...:	HA-5-6'	REMARKS.....: 1 brsolv-soil			
DESCRIPTION	FINAL RESULT	LIMIT/DETECTION UNITS OF MEASURE	TEST METHOD	DATE	TESTER
petroleum Hydrocarbons		*1	EPA 8015 (modified)	09/22/94	RVJ
oil	1300	10	EPA 8015 (modified)	09/22/94	VB
nic (As)	ND	30.0	EPA 6010		
ium (Cd)	ND	5.00	EPA 6010		
nium (Cr)	ND	5.00	EPA 6010		
(Pb)	ND	5.00	EPA 6010		
Hydrocarbons Extraction	COMPLETED	----	Cal. DHS Method	09/22/94	RV
inated Biphenyls		*5	EPA 8080	09/22/94	CIS
r-1016	ND	165	EPA 8080		
r-1221	ND	165	EPA 8080		
r-1232	ND	165	EPA 8080		
r-1242	ND	165	EPA 8080		
r-1248	ND	165	EPA 8080		
--1254	ND	165	EPA 8080		
--1260	ND	165	EPA 8080		
(toto-m-xylene (SURROGATE)	200	165	EPA 8080		
	77	0	% Recovery	QC LIMITS 40-130	

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**Core Laboratories**
**LABORATORY TESTS RESULTS**  
 09/23/94

NUMBER: 94-323

CUSTOMER: HITEC OIL Co./Advanced Resources

ATM: OIL Sample

 WT I.D. ....  
 SAMPLED....: 09/20/94  
 SAMPLED....: 18:45  
 DESCRIPTION...: HA-5-9

 LABORATORY I.D... 942323-0015  
 DATE RECEIVED....: 09/21/94  
 TIME RECEIVED....: 12:35  
 REMARKS.....: 1 brassy-soil

DESCRIPTION	FINAL RESULT	LIMITS/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
digestion for ICP	COMPLETED	-----	N/A	EPA 3050	09/21/94	EAW
digitation Extraction for PCBs	COMPLETED	-----	N/A	EPA 3550	09/22/94	DC
Organics by GC/MS		*5		EPA 8240	09/22/94	CIS
none		50	ug/kg	EPA 8240		
zene	ND	25	ug/kg	EPA 8240		
iodichloromethane	ND	25	ug/kg	EPA 8240		
oform	ND	25	ug/kg	EPA 8240		
methane	ND	50	ug/kg	EPA 8240		
thane	ND	50	ug/kg	EPA 8240		
on disulfide	ND	25	ug/kg	EPA 8240		
on tetrachloride	ND	25	ug/kg	EPA 8240		
robenzene	ND	25	ug/kg	EPA 8240		
odibromomethane	ND	25	ug/kg	EPA 8240		
oethane	ND	50	ug/kg	EPA 8240		
oroethylvinyl ether	ND	50	ug/kg	EPA 8240		
oform	ND	25	ug/kg	EPA 8240		
methane	ND	50	ug/kg	EPA 8240		
chloroethane	ND	25	ug/kg	EPA 8240		
ichloroethane	ND	25	ug/kg	EPA 8240		
ichloroethene	ND	25	ug/kg	EPA 8240		
1,2-Dichloroethenes	ND	25	ug/kg	EPA 8240		
chloropropene	ND	25	ug/kg	EPA 8240		
3-Dichloropropene	ND	25	ug/kg	EPA 8240		
1,3-Dichloropropene	ND	25	ug/kg	EPA 8240		
enzen	ND	25	ug/kg	EPA 8240		
one	ND	50	ug/kg	EPA 8240		
ne Chloride	ND	25	ug/kg	EPA 8240		
l-2-pentanone	ND	50	ug/kg	EPA 8240		
Tetrachloroethane	ND	25	ug/kg	EPA 8240		
loroethene	ND	25	ug/kg	EPA 8240		
ichloroethane	ND	25	ug/kg	EPA 8240		
ichloroethane	ND	25	ug/kg	EPA 8240		
oethene	ND	25	ug/kg	EPA 8240		
estate	ND	25	ug/kg	EPA 8240		
loride	ND	50	ug/kg	EPA 8240		
ones	ND	50	ug/kg	EPA 8240		
roethane (SURROGATE)	95	0	% Recovery	70-121% QC LIMITS		
le (SURROGATE)	100	0	% Recovery	88-110% QC LIMITS		
urobenzene (SURROGATE)	139(a)	0	% Recovery	74-121% QC LIMITS		

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## Core Laboratories

LABORATORY TESTS RESULTS  
09/23/94

NUMBER: 942323

CUSTOMER: DIXIE OIL CO./Advanced Resources

ATM: Del Parker

T.I.D.....  
SAMPLED....: 09/20/94  
SAMPLED....: 18:45  
DESCRIPTION...: HA-5-9\*

LABORATORY I.D....: 942323-0015  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brssly-soil

DESCRIPTION	FINAL RESULT	LIMITS/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN.
Petroleum Hydrocarbons sol	790	*1 10 *100	mg/kg	EPA 8015 (modified) EPA 8015 (modified)	09/22/94	RWJ
nic (As) nium (Cd) mium (Cr) l (Pb)	ND ND 5.2 ND	30.0 5.00 5.00 5.00	mg/kg mg/kg mg/kg mg/kg	EPA 6010 EPA 6010 EPA 6010 EPA 6010	09/22/94	VB
ydrocarbons Extraction	COMPLETED	-----	N/A	Cal. DHS Method	09/22/94	RW
minated Biphenyls or-1016 or-1221 or-1232 or-1242 or-1248 or-1254 or-1260 hloro-m-xylene (SURROGATE)	ND ND ND ND ND ND ND 107	660 660 660 660 660 660 660 0	ug/kg ug/kg ug/kg ug/kg ug/kg ug/kg ug/kg % Recovery	EPA 8080 EPA 8080 EPA 8080 EPA 8080 EPA 8080 EPA 8080 EPA 8080 QC LIMITS 40-130	09/22/94	CIS

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## Core Laboratories

LABORATORY TESTS RESULTS  
09/23/94

ORDER# 942323 CUSTOMER: DICO-DIV CO./Advanced Resources ATTN: Del Parker

T I.D.....  
SAMPLED....: 09/21/94  
SAMPLED....: 09:05  
DESCRIPTION...: HA-6-3'LABORATORY I.D...: 942323-0016  
DATE RECEIVED...: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brslv-soil

DESCRIPTION	FINAL RESULT	IMPROV/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	DECRN
Digestion for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EAN
Solvent Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/22/94	DC
Organics by GC/MS		*1		EPA 8240	09/22/94	CIS
Acetone	ND	10	ug/kg	EPA 8240		
Benzene	ND	5	ug/kg	EPA 8240		
Iodomethylchloromethane	ND	5	ug/kg	EPA 8240		
Iodomethane	ND	5	ug/kg	EPA 8240		
Bromomethane	ND	10	ug/kg	EPA 8240		
2-Butanone	ND	10	ug/kg	EPA 8240		
Carbon disulfide	ND	5	ug/kg	EPA 8240		
Carbon tetrachloride	ND	5	ug/kg	EPA 8240		
Chlorobenzene	ND	5	ug/kg	EPA 8240		
Chlorodibromomethane	ND	5	ug/kg	EPA 8240		
Chloroethane	ND	10	ug/kg	EPA 8240		
2-Chloroethylvinyl ether	ND	10	ug/kg	EPA 8240		
Chloroform	ND	5	ug/kg	EPA 8240		
Chloromethane	ND	10	ug/kg	EPA 8240		
1,1-Dichloroethane	ND	5	ug/kg	EPA 8240		
1,2-Dichloroethane	ND	5	ug/kg	EPA 8240		
1,1-Dichloroethene	ND	5	ug/kg	EPA 8240		
Total 1,2-Dichloroethenes	ND	5	ug/kg	EPA 8240		
1,2-Dichloropropane	ND	5	ug/kg	EPA 8240		
cis-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
trans-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
Ethylbenzene	ND	5	ug/kg	EPA 8240		
2-Hexanone	ND	10	ug/kg	EPA 8240		
Methylene Chloride	ND	5	ug/kg	EPA 8240		
4-Methyl-2-pentanone	ND	10	ug/kg	EPA 8240		
Styrene	ND	5	ug/kg	EPA 8240		
1,1,2,2-Tetrachloroethane	ND	5	ug/kg	EPA 8240		
Tetrachloroethene	ND	5	ug/kg	EPA 8240		
1,1,1-Trichloroethane	ND	5	ug/kg	EPA 8240		
1,1,2-Trichloroethane	ND	5	ug/kg	EPA 8240		
Trichloroethene	ND	5	ug/kg	EPA 8240		
Toluene	ND	5	ug/kg	EPA 8240		
Vinyl acetate	ND	10	ug/kg	EPA 8240		
Vinyl chloride	ND	10	ug/kg	EPA 8240		
Total Xylenes	ND	5	ug/kg	EPA 8240		
d4-Dichloroethane (SURROGATE)	89	0	% Recovery	70-121% QC LIMITS		
d8-Toluene (SURROGATE)	94	0	% Recovery	88-110% QC LIMITS		
4-Bromofluorobenzene (SURROGATE)	95	0	% Recovery	74-121% QC LIMITS		

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## Core Laboratories

LABORATORY TESTS RESULTS  
09/23/94

942323 CUSTOMER: DICO OIL CO./Advanced Resources

ITEM DATE ISSUED

ED.....: 09/21/94  
 ED.....: 09:05  
 OPTION...: HA-6-3

LABORATORY I.D....: 942323-0016  
 DATE RECEIVED....: 09/21/94  
 TIME RECEIVED....: 12:35  
 REMARKS.....: 1 brsslv-soil

OPTION	FINAL RESULT	ETHERS/PETROLEUM	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
oleum Hydrocarbons	ND	*1 10 *100	mg/kg	EPA 8015 (modified) EPA 8015 (modified) EPA 6010	09/22/94	RVJ
c (As)	ND	30.0	mg/kg	EPA 6010	09/22/94	VB
m (Cd)	ND	5.00	mg/kg	EPA 6010		
Um (Cr)	ND	5.00	mg/kg	EPA 6010		
Pb)	ND	5.00	mg/kg	EPA 6010		
ocarbons Extraction	COMPLETED	-----	N/A	Cal. DHS Method	09/22/94	RW
nated Biphenyls		*1		EPA 8080	09/22/94	CIS
r-1016	ND	33	ug/kg	EPA 8080		
r-1221	ND	33	ug/kg	EPA 8080		
r-1232	ND	33	ug/kg	EPA 8080		
r-1242	ND	33	ug/kg	EPA 8080		
r-1248	ND	33	ug/kg	EPA 8080		
r-1254	ND	33	ug/kg	EPA 8080		
r-1260	ND	33	ug/kg	EPA 8080		
chloro-m-xylene (SURROGATE)	75	0	% Recovery	QC LIMITS 40-130		

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### LABORATORY TESTS RESULTS 09/23/94

Project: DTECH-94-1 Advanced Resources      Attm: Del Parker

ED.....: 09/21/94  
ED.....: 09:21  
IPTION...: HA-6-6'

LABORATORY I.D....: 942323-0017  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brssly-soil

ITEM	FINAL RESULT	LIMITS/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
tion for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EAW
Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/22/94	DC
organics by GC/MS		*1		EPA 8240	09/22/94	CIS
c	ND	10	ug/kg	EPA 8240		
e	ND	5	ug/kg	EPA 8240		
chloromethane	ND	5	ug/kg	EPA 8240		
form	ND	5	ug/kg	EPA 8240		
ethane	ND	10	ug/kg	EPA 8240		
none	ND	10	ug/kg	EPA 8240		
disulfide	ND	5	ug/kg	EPA 8240		
tetrachloride	ND	5	ug/kg	EPA 8240		
benzene	ND	5	ug/kg	EPA 8240		
dibromomethane	ND	5	ug/kg	EPA 8240		
methane	ND	10	ug/kg	EPA 8240		
croethylvinyl ether	ND	10	ug/kg	EPA 8240		
form	ND	5	ug/kg	EPA 8240		
methane	ND	10	ug/kg	EPA 8240		
chloroethane	ND	5	ug/kg	EPA 8240		
chloroethane	ND	5	ug/kg	EPA 8240		
chloroethene	ND	5	ug/kg	EPA 8240		
1,2-Dichloroethanes	ND	5	ug/kg	EPA 8240		
chloropropane	ND	5	ug/kg	EPA 8240		
3-Dichloropropene	ND	5	ug/kg	EPA 8240		
1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
xenzeno	ND	5	ug/kg	EPA 8240		
none	ND	10	ug/kg	EPA 8240		
ene chloride	ND	5	ug/kg	EPA 8240		
yl-2-pantanone	ND	10	ug/kg	EPA 8240		
ne	ND	5	ug/kg	EPA 8240		
,2-Tetrachloroethane	ND	5	ug/kg	EPA 8240		
chloroethene	ND	5	ug/kg	EPA 8240		
-Trichloroethane	ND	5	ug/kg	EPA 8240		
-Trichloroethane	ND	5	ug/kg	EPA 8240		
ne	ND	5	ug/kg	EPA 8240		
acetate	ND	10	ug/kg	EPA 8240		
chloride	ND	10	ug/kg	EPA 8240		
Xylenes	ND	5	ug/kg	EPA 8240		
chloroethane (SURROGATE)	88	0	% Recovery	70-121% QC LIMITS		
luene (SURROGATE)	96	0	% Recovery	88-110% QC LIMITS		
nofluorobenzene (SURROGATE)	100	0	% Recovery	74-121% QC LIMITS		

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LABORATORY TESTS RESULTS  
09/23/94

9423 CUSTOMER: VICO-OIL CO./Advanced Resources DATE: Det. Parker

ED.....: 09/21/94  
ED.....: 09:21  
OPTION...: HA-6-6LABORATORY I.D....: 942323-0017  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brsslv-soil

ITEM	FINAL RESULT	LIMITS/DEFINITION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN.
Oil Hydrocarbons		*1		EPA 8015 (modified)	09/22/94	RVJ
	ND	10	mg/kg	EPA 8015 (modified)		
		*100		EPA 6010	09/22/94	VB
IC (As)	ND	30.0	mg/kg	EPA 6010		
IC (Cd)	ND	5.00	mg/kg	EPA 6010		
um (Cr)	ND	5.00	mg/kg	EPA 6010		
Pb)	ND	5.00	mg/kg	EPA 6010		
arbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
inated Biphenyls		*1		EPA 8080	09/22/94	CIS
r-1016	ND	33	ug/kg	EPA 8080		
r-1221	ND	33	ug/kg	EPA 8080		
r-1232	ND	33	ug/kg	EPA 8080		
r-1242	ND	33	ug/kg	EPA 8080		
r-1248	ND	33	ug/kg	EPA 8080		
r-1254	ND	33	ug/kg	EPA 8080		
r-1260	ND	33	ug/kg	EPA 8080		
chloro-m-xylene (SURROGATE)	79	0	% Recovery	QC LIMITS 40-130		

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### LABORATORY TESTS RESULTS 09/23/94

CUSTOMER: DDCO-DIE Co./Advanced Resources		ITEM: DCL Project			
DATE: 09/21/94		LABORATORY I.D.: 942323-001B			
TIME: 09:39		DATE RECEIVED: 09/21/94			
TION: HA-6-91		TIME RECEIVED: 12:35			
REMARKS: 1 brsslv-soil					
ITEM	FINAL RESULT	LIMITS/CALCULATED UNITS OF MEASURE	TEST METHOD	DATE	TECHN
on for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94 EAM
xtraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/22/94 DC
anics by GC/MS		*1		EPA 8240	09/22/94 CIS
chloromethane	ND	10 ug/kg	EPA 8240		
methane	ND	5 ug/kg	EPA 8240		
ene	ND	5 ug/kg	EPA 8240		
sulfide	ND	10 ug/kg	EPA 8240		
trachloride	ND	5 ug/kg	EPA 8240		
zene	ND	5 ug/kg	EPA 8240		
bromomethane	ND	5 ug/kg	EPA 8240		
hene	ND	10 ug/kg	EPA 8240		
ethylvinyl ether	ND	10 ug/kg	EPA 8240		
rm	ND	5 ug/kg	EPA 8240		
thane	ND	10 ug/kg	EPA 8240		
loroethane	ND	5 ug/kg	EPA 8240		
loroethane	ND	5 ug/kg	EPA 8240		
loroethene	ND	5 ug/kg	EPA 8240		
2-Dichloroethanes	ND	5 ug/kg	EPA 8240		
Dichloropropene	ND	5 ug/kg	EPA 8240		
3-Dichloropropene	ND	5 ug/kg	EPA 8240		
izene	ND	5 ug/kg	EPA 8240		
ne	ND	10 ug/kg	EPA 8240		
ne Chloride	ND	5 ug/kg	EPA 8240		
-2-pentanone	ND	10 ug/kg	EPA 8240		
Tetrachloroethane	ND	5 ug/kg	EPA 8240		
oroethene	ND	5 ug/kg	EPA 8240		
ichloroethane	ND	5 ug/kg	EPA 8240		
oethene	ND	5 ug/kg	EPA 8240		
zate	ND	10 ug/kg	EPA 8240		
loride	ND	10 ug/kg	EPA 8240		
lenes	ND	5 ug/kg	EPA 8240		
Loroethane (SURROGATE)	96	0 % Recovery	70-121% QC LIMITS		
ene (SURROGATE)	100	0 % Recovery	88-110% QC LIMITS		
luorobenzene (SURROGATE)	105	0 % Recovery	74-121% QC LIMITS		

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LABORATORY TESTS RESULTS  
09/23/94

942323		CUSTOMER	DISC.DR.DAT/Advanced Resources	ATTN:	Per Marker	
ED.....	09/21/94			LABORATORY I.D....:	942323-0018	
ED.....	09:39			DATE RECEIVED....:	09/21/94	
SECTION....	HA-6-9'			TIME RECEIVED....:	12:35	
				REMARKS.....	1 brsslv-soil	
SECTION	FINAL RESULT	LIMITS/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHNIQUE
olefin Hydrocarbons		*1		EPA 8015 (modified)	09/22/94	RVJ
	ND	10	mg/kg	EPA 8015 (modified)		
		*100		EPA 6010	09/22/94	VB
c (As)	ND	30.0	ug/kg	EPA 6010		
m (Cd)	ND	5.00	ug/kg	EPA 6010		
Um (Cr)	ND	5.00	ug/kg	EPA 6010		
Pb)	ND	5.00	ug/kg	EPA 6010		
carbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
nated Biphenyls		*1		EPA 8080	09/22/94	CIS
r-1016	ND	33	ug/kg	EPA 8080		
--1221	ND	33	ug/kg	EPA 8080		
--1232	ND	33	ug/kg	EPA 8080		
--1242	ND	33	ug/kg	EPA 8080		
--1248	ND	33	ug/kg	EPA 8080		
--1254	ND	33	ug/kg	EPA 8080		
--1260	ND	33	ug/kg	EPA 8080		
chloro-m-xylene (SURROGATE)	76	0	% Recovery	QC LIMITS 40-130		

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## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

NUMBER: 942323 CUSTOMER: DIXO OIL Co./Advanced Resources ATTN: Det. Parker

T I.D.....  
SAMPLED.... 09/21/94  
SAMPLED.... 10:16  
DESCRIPTION... HA-7-3\*

LABORATORY I.D.... 942323-0019  
DATE RECEIVED.... 09/21/94  
TIME RECEIVED.... 12:35  
REMARKS..... 1 brsslv-soil

DESCRIPTION	FINAL RESULT	UNITS/CONDITION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
Digestion for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EAW
ation Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/23/94	DC
ile Organics by GC/MS		*1		EPA 8240	09/22/94	CIS
zene	ND	10	ug/kg	EPA 8240		
zenes	ND	5	ug/kg	EPA 8240		
romodichloromethane	ND	5	ug/kg	EPA 8240		
romoform	ND	5	ug/kg	EPA 8240		
romomethane	ND	10	ug/kg	EPA 8240		
utanone	ND	10	ug/kg	EPA 8240		
arbon disulfide	ND	5	ug/kg	EPA 8240		
arbon tetrachloride	ND	5	ug/kg	EPA 8240		
lorobenzene	ND	5	ug/kg	EPA 8240		
lorof bromomethane	ND	5	ug/kg	EPA 8240		
loroethane	ND	10	ug/kg	EPA 8240		
Chloroethylvinyl ether	ND	10	ug/kg	EPA 8240		
Loroform	ND	5	ug/kg	EPA 8240		
lormethane	ND	10	ug/kg	EPA 8240		
1-Dichloroethane	ND	5	ug/kg	EPA 8240		
2-Dichloroethane	ND	5	ug/kg	EPA 8240		
1-Dichloroethene	ND	5	ug/kg	EPA 8240		
tal 1,2-Dichloroethenes	ND	5	ug/kg	EPA 8240		
2-Dichloropropane	ND	5	ug/kg	EPA 8240		
o-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
ans-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
ylbenzene	ND	5	ug/kg	EPA 8240		
exanone	ND	10	ug/kg	EPA 8240		
thylene Chloride	ND	5	ug/kg	EPA 8240		
ethyl-2-pantanone	ND	10	ug/kg	EPA 8240		
rene	ND	5	ug/kg	EPA 8240		
1,2,2-Tetrachloroethane	ND	5	ug/kg	EPA 8240		
trachloroethene	ND	5	ug/kg	EPA 8240		
1,1-Trichloroethane	ND	5	ug/kg	EPA 8240		
1,2-Trichloroethane	ND	5	ug/kg	EPA 8240		
chloroethene	ND	5	ug/kg	EPA 8240		
ene	ND	5	ug/kg	EPA 8240		
yl acetate	ND	10	ug/kg	EPA 8240		
yl chloride	ND	10	ug/kg	EPA 8240		
al Klyenes	ND	5	ug/kg	EPA 8240		
Bichloroethane (SURROGATE)	98	0	% Recovery	70-121% QC LIMITS		
Toluene (SURROGATE)	96	0	% Recovery	88-110% QC LIMITS		
romofluorobenzene (SURROGATE)	106	0	% Recovery	74-121% QC LIMITS		

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LABORATORY TESTS RESULTS  
09/23/94

942323 CUSTOMER: DICO Off. to: Advanced Resources

ATLANTA, GA - Parker

ED.....: 09/21/94  
ED.....: 10:16  
OPTION...: HA-7-3<sup>1</sup>LABORATORY I.D....: 942323-0019  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brssly-soil

ITEM	FINAL RESULT	UNITS/DEFINITION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
oleum Hydrocarbons	ND	*1	mg/kg	EPA 8015 (modified)	09/22/94	RVJ
		10	mg/kg	EPA 8015 (modified)		
		*100	mg/kg	EPA 6010	09/22/94	VB
c (As)	ND	30.0	mg/kg	EPA 6010		
m (Cd)	ND	5.00	mg/kg	EPA 6010		
u/m (Cr)	7.5	5.00	mg/kg	EPA 6010		
Pb)	ND	5.00	mg/kg	EPA 6010		
ocarbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
nated Biphenyls		*1		EPA 8080	09/22/94	CIS
r-1016	ND	33	ug/kg	EPA 8080		
r-1221	ND	33	ug/kg	EPA 8080		
r-1232	ND	33	ug/kg	EPA 8080		
r-1242	ND	33	ug/kg	EPA 8080		
r-1248	ND	33	ug/kg	EPA 8080		
r-1254	ND	33	ug/kg	EPA 8080		
r-1260	ND	33	ug/kg	EPA 8080		
chloro-m-xylene (SURROGATE)	79	0	% Recovery	GC LIMITS 40-130		

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## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

WORK# 942323 CUSTOMER: DDC-DT Co./Advanced Resources ATTN: Del. Parker

I.D.....  
AMPLED....: 09/21/94  
AMPLED....: 10:48  
DESCRIPTION...: HA-7-6<sup>4</sup>

LABORATORY I.D...: 942323-0020  
DATE RECEIVED...: 09/21/94  
TIME RECEIVED...: 12:35  
REMARKS.....: 1 brssly-soil

DESCRIPTION	FINAL RESULT	TIME OF EXECUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECH
digestion for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EAW
tion Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/23/94	DC
le Organics by GC/MS		*1		EPA 8240	09/22/94	CIS
etone	ND	10	ug/kg	EPA 8240		
nzene	ND	5	ug/kg	EPA 8240		
omodichloromethane	ND	5	ug/kg	EPA 8240		
omofrom	ND	5	ug/kg	EPA 8240		
omomethane	ND	10	ug/kg	EPA 8240		
Butanone	ND	10	ug/kg	EPA 8240		
arbon disulfide	ND	5	ug/kg	EPA 8240		
arbon tetrachloride	ND	5	ug/kg	EPA 8240		
lorobenzene	ND	5	ug/kg	EPA 8240		
lorodibromomethane	ND	5	ug/kg	EPA 8240		
loroethane	ND	10	ug/kg	EPA 8240		
Chloroethylvinyl ether	ND	10	ug/kg	EPA 8240		
loroform	ND	5	ug/kg	EPA 8240		
loromethane	ND	10	ug/kg	EPA 8240		
1-Dichloroethane	ND	5	ug/kg	EPA 8240		
2-Dichloroethane	ND	5	ug/kg	EPA 8240		
1-Dichloroethene	ND	5	ug/kg	EPA 8240		
stat 1,2-Dichloroethenes	ND	5	ug/kg	EPA 8240		
2-Dichloropropane	ND	5	ug/kg	EPA 8240		
is-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
ans-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
ethylbenzene	ND	10	ug/kg	EPA 8240		
Hexahadec	ND	10	ug/kg	EPA 8240		
ethylene Chloride	ND	5	ug/kg	EPA 8240		
Methyl-2-pentanone	ND	10	ug/kg	EPA 8240		
Tyrene	ND	5	ug/kg	EPA 8240		
,1,2,2-Tetrachloroethane	ND	5	ug/kg	EPA 8240		
trachloroethene	ND	5	ug/kg	EPA 8240		
,1,1-Trichloroethane	ND	5	ug/kg	EPA 8240		
,1,2-Trichloroethane	ND	5	ug/kg	EPA 8240		
ichloroethene	ND	5	ug/kg	EPA 8240		
luene	ND	5	ug/kg	EPA 8240		
inyl acetate	ND	10	ug/kg	EPA 8240		
inyl chloride	ND	10	ug/kg	EPA 8240		
stat Xylenes	ND	5	ug/kg	EPA 8240		
4-Dichloroethane (SURROGATE)	94	0	% Recovery	70-121% QC LIMITS		
3-Toluene (SURROGATE)	94	0	% Recovery	88-110% QC LIMITS		
-Bromofluorobenzene (SURROGATE)	108	0	% Recovery	74-121% QC LIMITS		

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## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

SAMPLE NUMBER: 04229

CUSTOMER: DICO-OIL Co./Advanced Resources

ATTN: Jeff Parker

DATE: 09/21/94  
 DUE: 10:48  
 SECTION: HA-7-6\*

LABORATORY I.D.: 942323-0020  
 DATE RECEIVED: 09/21/94  
 TIME RECEIVED: 12:35  
 REMARKS: 1 brsolv-soil

SECTION	FINAL RESULT	UNITS/MEASURE	DEFINITION/MEASURE	TEST METHOD	DATE	TECHN.
oium Hydrocarbons		#1		EPA 8015 (modified)	09/22/94	RVJ
As (As)	ND	10	mg/kg	EPA 8015 (modified)		
Cd (Cd)	ND	100	mg/kg	EPA 6010	09/22/94	V8
rm (Cr)	ND	30.0	mg/kg	EPA 6010		
ob)	ND	5.00	mg/kg	EPA 6010		
ocarbons Extraction	COMPLETED	5.00	mg/kg	EPA 6010		
nated Biphenyls		5.00	mg/kg	EPA 6010		
r-1016	ND	5.00	mg/kg	EPA 6010		
r-1221	ND	5.00	mg/kg	EPA 6010		
r-1232	ND	5.00	mg/kg	EPA 6010		
r-1242	ND	5.00	mg/kg	EPA 6010		
r-1248	ND	5.00	mg/kg	EPA 6010		
r-1254	ND	5.00	mg/kg	EPA 6010		
r-1260	ND	5.00	mg/kg	EPA 6010		
chloro-m-xylene (SURROGATE)	78	0	% Recovery	QC LIMITS 40-130		

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## Core Laboratories

### LABORATORY TESTS RESULTS 09/23/94

942323 CUSTOMER: DICO-DI-LO // Advanced Resources ATTN: DALE PASKET

ED.....: 09/21/94  
ED.....:  
OPTION...: HA-7-91

LABORATORY I.D...: 942323-0021  
DATE RECEIVED...: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brssly-soil

OPTION	FINAL RESULT	LIMITS/NOTIFICATION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN.
tion for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EAN
Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/23/94	DC
organics by GC/MS		*1		EPA 8240	09/22/94	GTS
ene	ND	10	ug/kg	EPA 8240		
e	ND	5	ug/kg	EPA 8240		
lchloromethane	ND	5	ug/kg	EPA 8240		
orm	ND	5	ug/kg	EPA 8240		
ethane	ND	10	ug/kg	EPA 8240		
none	ND	10	ug/kg	EPA 8240		
s disulfide	ND	5	ug/kg	EPA 8240		
s tetrachloride	ND	5	ug/kg	EPA 8240		
benzene	ND	5	ug/kg	EPA 8240		
dibromomethane	ND	5	ug/kg	EPA 8240		
ethane	ND	10	ug/kg	EPA 8240		
roethylvinyl ether	ND	10	ug/kg	EPA 8240		
form	ND	5	ug/kg	EPA 8240		
methane	ND	10	ug/kg	EPA 8240		
Chloroethano	ND	5	ug/kg	EPA 8240		
ichloroethane	ND	5	ug/kg	EPA 8240		
ichloroethene	ND	5	ug/kg	EPA 8240		
1,2-Dichloroethenes	ND	5	ug/kg	EPA 8240		
ichloropropane	ND	5	ug/kg	EPA 8240		
,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
-1,3-Dichloropropene	ND	5	ug/kg	EPA 8240		
benzene	ND	5	ug/kg	EPA 8240		
anone	ND	10	ug/kg	EPA 8240		
lene Chloride	ND	5	ug/kg	EPA 8240		
yl-2-pentanone	ND	10	ug/kg	EPA 8240		
ne	ND	5	ug/kg	EPA 8240		
,2-Tetrachloroethane	ND	5	ug/kg	EPA 8240		
chloroethene	ND	5	ug/kg	EPA 8240		
-Trichloroethane	ND	5	ug/kg	EPA 8240		
-Trichloroethene	ND	5	ug/kg	EPA 8240		
ne	ND	5	ug/kg	EPA 8240		
acetate	ND	10	ug/kg	EPA 8240		
chloride	ND	10	ug/kg	EPA 8240		
Xylenes	ND	5	ug/kg	EPA 8240		
chloroethane (SURROGATE)	92	0	% Recovery	70-121% QC LIMITS		
luene (SURROGATE)	100	0	% Recovery	88-110% QC LIMITS		
nofluorobenzene (SURROGATE)	102	0	% Recovery	74-121% QC LIMITS		

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## Core Laboratories

LABORATORY TESTS RESULTS  
09/23/94

CUSTOMER: DICO OIL DRG//Advanced Resources		ATM: Pet. Petro	
.....	.....	LABORATORY I.D....: 942323-0021	
DATE.....: 09/21/94		DATE RECEIVED....: 09/21/94	
ED.....:		TIME RECEIVED....: 12:35	
OPTION....: HA-7-91		REMARKS.....: 1 brassy-soil	
ITEM	FINAL RESULT	UNITS OF MEASURE	TEST METHOD
oelum Hydrocarbons	ND	*1 10 *100	EPA 8015 (modified) EPA 8015 (modified) EPA 6010
c (As)	ND	30.0	EPA 6010
m (Cd)	ND	5.00	EPA 6010
mm (Cr)	ND	5.00	EPA 6010
Pb)	ND	5.00	EPA 6010
ocarbons Extraction	COMPLETED	----	Cal. DHS Method
nated Biphenyls		*1	EPA 8080
r-1016	ND	33	EPA 8080
r-1221	ND	33	EPA 8080
r-1232	ND	33	EPA 8080
r-1242	ND	33	EPA 8080
r-1248	ND	33	EPA 8080
r-1254	ND	33	EPA 8080
r-1260	ND	33	EPA 8080
chloro-m-xylene (SURROGATE)	79	0 % Recovery	QC LIMITS 40-130

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## Core Laboratories

LABORATORY TESTS RESULTS  
09/23/94

042323 CUSTOMER: DTCO-OIL Co // Advanced Resources

ATTN: Del Parker

.....: 09/21/94  
.....:  
PTION...: HA-8-3LABORATORY I.D....: 942323-0022  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brssly-soil

ITEM	FINAL RESULT	LIMITS/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHNIQUE
ion for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EAM
Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/23/94	DC
ganics by GC/MS		*5		EPA 8240	09/22/94	GIS
chloromethane	ND	50	ug/kg	EPA 8240		
chloromethane	ND	25	ug/kg	EPA 8240		
form	ND	25	ug/kg	EPA 8240		
ethane	ND	50	ug/kg	EPA 8240		
none	ND	50	ug/kg	EPA 8240		
disulfide	ND	25	ug/kg	EPA 8240		
tetrachloride	ND	25	ug/kg	EPA 8240		
benzene	ND	25	ug/kg	EPA 8240		
dibromomethane	ND	25	ug/kg	EPA 8240		
ethane	ND	50	ug/kg	EPA 8240		
roethylvinyl ether	ND	50	ug/kg	EPA 8240		
form	ND	25	ug/kg	EPA 8240		
methane	ND	50	ug/kg	EPA 8240		
chloroethane	ND	25	ug/kg	EPA 8240		
chloroethane	ND	25	ug/kg	EPA 8240		
chloroethene	ND	25	ug/kg	EPA 8240		
1,2-Dichloroethenes	ND	25	ug/kg	EPA 8240		
chloropropene	ND	25	ug/kg	EPA 8240		
,3-Dichloropropene	ND	25	ug/kg	EPA 8240		
-1,3-Dichloropropene	ND	25	ug/kg	EPA 8240		
benzene	ND	25	ug/kg	EPA 8240		
anone	ND	50	ug/kg	EPA 8240		
lene Chloride	ND	25	ug/kg	EPA 8240		
yl-2-pentanone	ND	50	ug/kg	EPA 8240		
ne	ND	25	ug/kg	EPA 8240		
,2-Tetrachloroethane	ND	25	ug/kg	EPA 8240		
chloroethene	190	25	ug/kg	EPA 8240		
-Trichloroethane	ND	25	ug/kg	EPA 8240		
-Trichloroethane	ND	25	ug/kg	EPA 8240		
loroethene	ND	25	ug/kg	EPA 8240		
ne	230	25	ug/kg	EPA 8240		
acetate	ND	50	ug/kg	EPA 8240		
chloride	ND	50	ug/kg	EPA 8240		
Xylenes	1100	25	ug/kg	EPA 8240		
ichloroethane (SURROGATE)	91	0	% Recovery	70-121% QC LIMITS		
luene (SURROGATE)	116(a)	0	% Recovery	88-110% QC LIMITS		
monoFluorobenzene (SURROGATE)	225(a)	0	% Recovery	74-121% QC LIMITS		

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LABORATORY TESTS RESULTS  
09/23/94

062323 CUSTOMER: DINO-OIL Co./Advanced Research ATTN: Mike Parker

ED.....: 09/21/94  
ED.....: :  
OPTION...: HA-8-3

LABORATORY I.D...: 942323-0022  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brashv-soil

OPTION	FINAL RESULT	LIMITS/DITION	UNITS/UE MEASURE	TEST METHOD	DATE	TECHN
oleum Hydrocarbons		*1		EPA 8015 (modified)	09/22/94	RVJ
	ND	500	mg/kg	EPA 8015 (modified)		
		*100		EPA 6010	09/22/94	VB
c (AS)	ND	30.0	mg/kg	EPA 6010		
m (Cd)	ND	5.00	mg/kg	EPA 6010		
um (Cr)	ND	5.00	mg/kg	EPA 6010		
Pb)	ND	5.00	mg/kg	EPA 6010		
rocarbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94	RW
inated Biphenyls		*20		EPA 8080	09/22/94	CIS
or-1016	ND	660	ug/kg	EPA 8080		
or-1221	ND	660	ug/kg	EPA 8080		
or-1232	ND	660	ug/kg	EPA 8080		
or-1242	ND	660	ug/kg	EPA 8080		
or-1248	ND	660	ug/kg	EPA 8080		
or-1254	ND	660	ug/kg	EPA 8080		
or-1260	4500	660	ug/kg	EPA 8080		
chloro-M-xylene (SURROGATE)	94	0	% Recovery	GC LIMITS 40-130		

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### LABORATORY TESTS RESULTS 09/23/94

2723 - CUSTOMER: BIRD OIL Co./Advanced Resources ATTN: Del Parker

ED.....: 09/21/94  
ED.....: :  
OPTION...: HA-8-6'

LABORATORY I.D.: 942323-0023  
DATE RECEIVED....: 09/21/94  
TIME RECEIVED....: 12:35  
REMARKS.....: 1 brsolv-soil

OPTION	FINAL RESULT	LIMITS/DILUTION	UNITS OF MEASURE	TEST METHOD	DATE	TECHN
tion for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EAU
Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/23/94	DC
Inorganics by GC/MS		*5		EPA 8240	09/22/94	CIS
ie	ND	50	ug/kg	EPA 8240		
ie	ND	25	ug/kg	EPA 8240		
Chloromethane	ND	25	ug/kg	EPA 8240		
Form	ND	25	ug/kg	EPA 8240		
ethane	ND	50	ug/kg	EPA 8240		
none	ND	50	ug/kg	EPA 8240		
disulfide	ND	25	ug/kg	EPA 8240		
tetrachloride	ND	25	ug/kg	EPA 8240		
benzene	ND	25	ug/kg	EPA 8240		
dibromomethane	ND	25	ug/kg	EPA 8240		
ethane	ND	50	ug/kg	EPA 8240		
propylvinyl ether	ND	50	ug/kg	EPA 8240		
Form	ND	25	ug/kg	EPA 8240		
methane	ND	50	ug/kg	EPA 8240		
chloroethane	ND	25	ug/kg	EPA 8240		
chloroethane	ND	25	ug/kg	EPA 8240		
chloroethene	ND	25	ug/kg	EPA 8240		
1,2-Dichloroethenes	ND	25	ug/kg	EPA 8240		
chloropropene	ND	25	ug/kg	EPA 8240		
,3-Dichloropropene	ND	25	ug/kg	EPA 8240		
-1,3-Dichloropropene	ND	25	ug/kg	EPA 8240		
benzene	ND	25	ug/kg	EPA 8240		
anone	ND	50	ug/kg	EPA 8240		
Tene Chloride	ND	25	ug/kg	EPA 8240		
hyl-2-pentanone	ND	50	ug/kg	EPA 8240		
ne	ND	25	ug/kg	EPA 8240		
,2-Tetrachloroethane	ND	25	ug/kg	EPA 8240		
chloroethene	ND	25	ug/kg	EPA 8240		
-Trichloroethane	ND	25	ug/kg	EPA 8240		
-Trichloroethane	ND	25	ug/kg	EPA 8240		
loroethene	ND	25	ug/kg	EPA 8240		
ne	ND	25	ug/kg	EPA 8240		
acetate	ND	50	ug/kg	EPA 8240		
chloride	ND	50	ug/kg	EPA 8240		
Xylenes	150	25	ug/kg	EPA 8240		
chlorobutane (SURROGATE)	92	0	% Recovery	70-121% QC LIMITS		
luene (SURROGATE)	105	0	% Recovery	88-110% QC LIMITS		
nonfluorobenzene (SURROGATE)	138(a)	0	% Recovery	74-121% QC LIMITS		

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## Core Laboratories

LABORATORY TESTS RESULTS  
09/26/94

942323		CUSTOMER	01200-01-Cov / Advanced Resources	ATTN:	Del Parker
D.....	09/21/94			LABORATORY I.D...:	942323-0023
D.....				DATE RECEIVED....:	09/21/94
PTION...	HA-8-6			TIME RECEIVED....:	12:35
				REMARKS.....	1 brssly-soft
ITEM	TESTS REQUESTED	RESULTS/ DILUTION	UNITS OF MEASURE	TEST METHOD	DATE TESTED
Steam Hydrocarbons		*1	mg/kg	EPA 8015 (modified)	09/22/94 RVJ
	1800	10	mg/kg	EPA 8015 (modified)	
		*100	mg/kg	EPA 6010	09/22/94 VB
As (As)	ND	30.0	mg/kg	EPA 6010	
Cd (Cd)	ND	5.00	mg/kg	EPA 6010	
Mn (Cr)	5.4	5.00	mg/kg	EPA 6010	
Pb (Pb)	ND	5.00	mg/kg	EPA 6010	
Carbons Extraction	COMPLETED	----	N/A	Cal. DHS Method	09/22/94 RW
inated Biphenyls		*5		EPA 8080	09/22/94 CIS
r-1016	ND	165	ug/kg	EPA 8080	
r-1221	ND	165	ug/kg	EPA 8080	
r-1252	ND	165	ug/kg	EPA 8080	
r-1242	ND	165	ug/kg	EPA 8080	
r-1268	ND	165	ug/kg	EPA 8080	
r-1254	ND	165	ug/kg	EPA 8080	
r-1260	ND	165	ug/kg	EPA 8080	
chloro-m-xylene (SURROGATE)	410	165	ug/kg	QC LIMITS 40-130	
	74	0	% Recovery		

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## Core Laboratories

LABORATORY TESTS RESULTS  
09/23/94

RS-94233 CUSTOMER: DICO SOTE DO./Advanced Resources ATTN: Del Parker  
 D.....: LABORATORY I.D....: 94233-0024  
 LED.....: 09/21/94 DATE RECEIVED....: 09/21/94  
 LED.....: : TIME RECEIVED....: 12:35  
 RIPTION...: HA-8-91 REMARKS.....: 1 brssly-soil

SECTION	FINAL RESULT	LIMITS/REDUCTION	UNITS OF MEASURE	TEST METHOD	DATE	CLAY
Extraction for ICP	COMPLETED	----	N/A	EPA 3050	09/21/94	EAV
1 Extraction for PCBs	COMPLETED	----	N/A	EPA 3550	09/23/94	DC
Organics by GC/MS		*5		EPA 8240	09/22/94	CIS
ne	95	50	ug/kg	EPA 8240		
ne	ND	25	ug/kg	EPA 8240		
dichloromethane	ND	25	ug/kg	EPA 8240		
form	ND	25	ug/kg	EPA 8240		
methane	ND	50	ug/kg	EPA 8240		
hone	ND	50	ug/kg	EPA 8240		
1 disulfide	ND	25	ug/kg	EPA 8240		
1 tetrachloride	ND	25	ug/kg	EPA 8240		
benzene	ND	25	ug/kg	EPA 8240		
xdibromomethane	ND	25	ug/kg	EPA 8240		
ethane	ND	50	ug/kg	EPA 8240		
proethylvinyl ether	ND	50	ug/kg	EPA 8240		
form	ND	25	ug/kg	EPA 8240		
methane	ND	50	ug/kg	EPA 8240		
chloroethane	ND	25	ug/kg	EPA 8240		
chloroethane	ND	25	ug/kg	EPA 8240		
chloroethene	ND	25	ug/kg	EPA 8240		
1,2-dichloroethenes	ND	25	ug/kg	EPA 8240		
chloropropene	ND	25	ug/kg	EPA 8240		
3-Dichloropropene	ND	25	ug/kg	EPA 8240		
1,3-Dichloropropene	ND	25	ug/kg	EPA 8240		
benzene	ND	25	ug/kg	EPA 8240		
hone	ND	50	ug/kg	EPA 8240		
ene Chloride	ND	25	ug/kg	EPA 8240		
yl-2-pantanone	ND	50	ug/kg	EPA 8240		
ne	ND	25	ug/kg	EPA 8240		
2-Tetrachloroethane	ND	25	ug/kg	EPA 8240		
chloroethene	ND	25	ug/kg	EPA 8240		
Trichloroethane	ND	25	ug/kg	EPA 8240		
Trichloroethane	ND	25	ug/kg	EPA 8240		
oroethene	ND	25	ug/kg	EPA 8240		
ne	ND	25	ug/kg	EPA 8240		
acetate	ND	50	ug/kg	EPA 8240		
chloride	ND	50	ug/kg	EPA 8240		
Xylenes	67	25	ug/kg	EPA 8240		
chloroethane (SURROGATE)	89	0	% Recovery	70-121% QC LIMITS		
uene (SURROGATE)	106	0	% Recovery	88-110% QC LIMITS		
ofluorobenzene (SURROGATE)	170(a)	0	% Recovery	74-121% QC LIMITS		

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## Core Laboratories

LABORATORY TESTS RESULTS  
09/23/94

PROJECT NUMBER		CUSTOMER INFORMATION		TEST INFORMATION	
942323		DUST-OIL CO./Advanced Resources		TESTER: DON PARKER	
ED.....: 09/21/94		LABORATORY I.D....: 942323-0024		DATE RECEIVED....: 09/21/94	
ED.....: :		TIME RECEIVED....: 12:35		REMARKS.....: 1 brssly-soil	
SECTION		FINAL RESULT	COMPARISON/RELATION	UNIT OF MEASURE	TEST METHOD
Total Hydrocarbons		ND	*1	mg/kg	EPA 8015 (modified)
As (As)		ND	50	mg/kg	EPA 8015 (modified)
Cd (Cd)		ND	*100	mg/kg	EPA 6010
Cr (Cr)		ND	30.0	mg/kg	EPA 6010
Pb (Pb)		ND	5.00	mg/kg	EPA 6010
Carbon Extraction		COMPLETED	-----	N/A	Cal. DHS Method
nated Biphenyls			*20	% Recovery	EPA 8080
-1016		ND	660	ug/kg	EPA 8080
-1221		ND	660	ug/kg	EPA 8080
-1232		ND	660	ug/kg	EPA 8080
-1242		ND	660	ug/kg	EPA 8080
-1248		ND	660	ug/kg	EPA 8080
-1254		ND	660	ug/kg	EPA 8080
-1260		ND	660	ug/kg	EPA 8080
tetro-m-xylene (SURROGATE)		2600	660	ug/kg	QC LIMITS 40-130
		83	0	% Recovery	

1250 Gene Autry Way  
Anaheim, CA 92805  
(714) 937-1094

## PROJECT INFORMATION

PROJECT NUMBER

## BILLING INFORMATION

BILL TO

ADDRESS

PHONE

FAX

LAB JOB NO.

ANALYSIS / REQUEST METHOD

3015  
PCB's  
RCRA  
DSCVOASBESTOS  
PCB's  
RCRA  
DSCVO

## NUMBER OF CONTAINERS

SAMPLE NO	SAMPLE ID	SAMPLE DATE	SAMPLE TIME	SAMPLE MATRIX	CONTAINER TYPE	PRES	REMARKS / PRECAUTIONS
HA-1-3'		9/20/94	1235	SOIL	STEEVE	None	1 X X X X X X X X
HA-1-6'			1300				1 X X X X X X X X
HA-1-7'			1330				1 X X X X X X X X
HA-2-3'			1405				1 X X X X X X X X
HA-2-6'			1434				1 X X X X X X X X
HA-2-9'			1446				1 X X X X X X X X
HA-3-3'			1519				1 X X X X X X X X
HA-3-6'			1530				1 X X X X X X X X
HA-3-9'			1551				1 X X X X X X X X
HA-4-3'			1613				1 X X X X X X X X
SAMPLER 11 Rolling/Geologic (Reseach)				SHIPMENT METHOD			AIRBILL NO
REQUIRED TURNAROUND:	<input type="checkbox"/> SAME DAY	<input type="checkbox"/> 24 HOURS	<input type="checkbox"/> 48 HOURS	<input type="checkbox"/> 72 HOURS	<input type="checkbox"/> 5 DAYS	<input type="checkbox"/> 10 DAYS	<input type="checkbox"/> ROUTINE OTHER
1 REQUINISHED BY SIGNATURE		DATE	2 REQUINISHED BY SIGNATURE		3 REQUINISHED BY SIGNATURE		DATE
PRINTED NAME/COMPANY		TIME	PRINTED NAME/COMPANY		PRINTED NAME/COMPANY		TIME
1 RECEIVED BY SIGNATURE		DATE	2 RECEIVED BY SIGNATURE		3 RECEIVED BY SIGNATURE		DATE
PRINTED NAME/COMPANY		TIME	PRINTED NAME/COMPANY		PRINTED NAME/COMPANY		TIME

\* RUSH TURNAROUND MAY REQUIRE SURCHARGE

- Anthem, California       Long Beach, California       Denver (Aurora), Colorado       Casper, Wyoming
- 1250 E Gene Autry Way      3700 Cherry Avenue      10103 E Bethany Drive      420 West 1st Street
- Anheim California 92805      Long Beach California 90807      Aurora, Colorado 80014      Casper Wyoming 82601
- (714) 937-1094      (310) 751-1180      (307) 655-3741      (307) 655-3741
- (800) 404-2673      (800) 972-2673      (800) 666-0306      (800) 666-0306
- Lake Charles Louisiana       Corpus Christi Texas
- 3645 Biols Parkway      1733 North Padre Island Drive
- Slidell Louisiana 70663      Corpus Christi Texas 78408
- (318) 563-4926      (512) 289-7873
- (800) 259-4936      (800) 734-2673

SHIPMENT METHOD

Environmental  
Civil  
Sanitary  
Structural

2601 Airport Drive, Suite 310  
Torrance, California 90505  
Telephone: (310) 539-1161  
Facsimile: (310) 325-0271

Jack K. Bryant **ENGINEERS**

a division of Bryant • Palmer • Soto, Inc.



DTSC - REGION 6  
RECEIVED

OCT 11 1994

October 5, 1994

FMS - PERMITTING

Allan Plaza  
Unit Chief  
Department of Toxic Substances Control  
1011 North Grandview Avenue  
Glendale, CA 91201

**RE: Environmental Site Assessment and Soil Analysis Report for  
DICO Oil Company in Signal Hill, CA.**

Dear Mr. Plaza:

Transmitted herewith for your review is the Environmental Site Assessment and Soil Analysis Report for DICO Oil Company in Signal Hill, California. The report has been prepared pursuant to the Department's letter of September 8, 1994.

Please feel free to call with any questions or comments that you may have.

Sincerely,

JACK K. BRYANT ENGINEERS  
*a division of Bryant • Palmer • Soto, Inc.*

*Jack K. Bryant /rs*

Jack K. Bryant, PE, REA  
Principal

cc: Jim Ennis / Del Parker  
DICO / Advanced Environmental  
2898 Gundry Avenue  
Signal Hill, CA 90806

James B. Riordin  
Law Offices of R. Moneymaker  
700 South Flower Street, Ste. 2102  
Los Angeles, CA 90017